

# **Exhibit M**

1                   IN THE UNITED STATES DISTRICT COURT

2                   NORTHERN DISTRICT OF ILLINOIS

3                   EASTERN DIVISION

4       WACKER DRIVE EXECUTIVE SUITES)

5       LLC, on behalf of itself            )

6       individually, and on behalf        )

7       of the others similarly            )

8       situated,                            )

9                                   Plaintiff,        ) Case No.

10                               vs.                        ) 1:18-cv-5492

11       JONES LANG LASALLE AMERICAS        )

12       (ILLINOIS), L.P.,                        )

13                                   Defendant.         )

14

15                   The videotaped deposition of ROBERT

16       KAESTNER, Ph.D., called as a witness for

17       examination, taken pursuant to the Federal Rules

18       of Civil Procedure of the United States District

19       Courts pertaining to the taking of depositions,

20       taken before ANDREA L. KIM, a Certified Shorthand

21       Reporter of said state, CSR No. 84-3722, at Suite

22       2150, 100 North Riverside Plaza, Chicago,

23       Illinois, on the 21st day of February, A.D. 2020,

24       at 9:29 a.m.

<p style="text-align: right;">Page 2</p> <p>1 PRESENT:</p> <p>2</p> <p>3 FOSTER PC,</p> <p>4 (150 North Wacker Drive, Suite 2150,</p> <p>5 Chicago, Illinois 60606</p> <p>6 312-726-1600), by:</p> <p>7 MR. HOWARD W. FOSTER,</p> <p>8 hfoster@fosterpc.com,</p> <p>9 MR. MATTHEW A. GALIN,</p> <p>10 -and-</p> <p>11 STEPHAN ZOURAS, LLP,</p> <p>12 (100 North Riverside Plaza, Suite 2150,</p> <p>13 Chicago, Illinois 60601</p> <p>14 312-233-1550), by:</p> <p>15 MR. JAMES B. ZOURAS,</p> <p>16 jzouras@stephanzouras.com,</p> <p>17 MS. ANNA CERAGIOLI,</p> <p>18 aceragioli@stephanzouras.com,</p> <p>19 -and-</p> <p>20</p> <p>21</p> <p>22</p> <p>23</p> <p>24</p>	<p style="text-align: right;">Page 4</p> <p>1 INDEX</p> <p>2</p> <p>3 WITNESS: PAGE:</p> <p>4 ROBERT KAESTNER, Ph.D.</p> <p>5 EXAM by MR. SCHUTTE..... 7</p> <p>6</p> <p>7 *****</p> <p>8 INDEX</p> <p>9 EXHIBIT NUMBER MARKED</p> <p>10 Exhibit No. 17..... 10</p> <p>11 Exhibit No. 18..... 26</p> <p>12 Exhibit No. 19..... 28</p> <p>13 Exhibit No. 20..... 68</p> <p>14 Exhibit No. 21..... 77</p> <p>15 Exhibit No. 22.....103</p> <p>16 Exhibit No. 23.....113</p> <p>17 Exhibit No. 24.....136</p> <p>18 Exhibit No. 25.....142</p> <p>19 Exhibit No. 26.....161</p> <p>20 Exhibit No. 27.....162</p> <p>21</p> <p>22</p> <p>23</p> <p>24</p>
<p style="text-align: right;">Page 3</p> <p>1 PRESENT: (Continued)</p> <p>2 THE WALNER LAW FIRM, LLC,</p> <p>3 (555 Skokie Boulevard, Suite 250,</p> <p>4 Northbrook, Illinois 60062</p> <p>5 312-371-2308), by:</p> <p>6 MR. AARON R. WALNER,</p> <p>7 awalner@walnerlawfirm.com,</p> <p>8 appeared on behalf of the Plaintiff</p> <p>9</p> <p>10 MORGAN, LEWIS &amp; BOCKIUS LLP,</p> <p>11 (77 West Wacker Drive, 5th Floor,</p> <p>12 Chicago, Illinois 60601</p> <p>13 312-324-1000), by:</p> <p>14 MR. SCOTT T. SCHUTTE,</p> <p>15 scott.schutte@morganlewis.com,</p> <p>16 MS. HEATHER J. NELSON,</p> <p>17 heather.nelson@morganlewis.com,</p> <p>18 appeared on behalf of the Defendant.</p> <p>19</p> <p>20 VIDEOTAPED BY:</p> <p>21 MR. KEVIN DUNCAN.</p> <p>22</p> <p>23 REPORTED BY: ANDREA L. KIM,</p> <p>24 Illinois CSR No. 84-3722.</p>	<p style="text-align: right;">Page 5</p> <p>1 THE VIDEOGRAPHER: Good morning. We are</p> <p>2 going on the video record at 9:29 a.m. Today's</p> <p>3 date is February 21, 2020. Please note that the</p> <p>4 microphones are sensitive and may pick up</p> <p>5 whispering, private conversations, and cellular</p> <p>6 interference. Please turn off all cell phones or</p> <p>7 place them away from the microphones as they can</p> <p>8 interfere with the deposition audio. Audio and</p> <p>9 video recording will continue to take place</p> <p>10 unless all parties agree to go off the record.</p> <p>11 Here begins media unit one in the</p> <p>12 video recorded deposition of Mr. Robert Kaestner</p> <p>13 taken on behalf of the defendants in the case</p> <p>14 matter of Wacker Drive Executive Suites, LLC,</p> <p>15 versus Jones Lang LaSalle Americas filed in the</p> <p>16 United States District Court for the Northern</p> <p>17 District of Illinois, bearing Case No.</p> <p>18 1:18-cv-5492.</p> <p>19 This deposition is being held at 100</p> <p>20 North Riverside Plaza in Chicago, Illinois. My</p> <p>21 name is Kevin Duncan, and I am a certified legal</p> <p>22 video specialist from the firm of Veritext Legal</p> <p>23 Solutions. The court reporter today is</p> <p>24 Ms. Andrea Kim from the firm of Veritext Legal</p>

<p style="text-align: right;">Page 6</p> <p>1 Solutions.</p> <p>2 I am not authorized to administer</p> <p>3 oaths. I am not related to any party in this</p> <p>4 action, nor am I financially interested in the</p> <p>5 outcome.</p> <p>6 Counsel, please identify yourselves</p> <p>7 starting with the noticing party.</p> <p>8 MR. SCHUTTE: Scott Schutte on behalf of the</p> <p>9 defendant Jones Lang LaSalle Americas Illinois,</p> <p>10 LP.</p> <p>11 MS. NELSON: Heather Nelson on behalf of the</p> <p>12 defendant Jones Lang LaSalle.</p> <p>13 MR. FOSTER: Howard Foster for the plaintiff</p> <p>14 Wacker Drive Executive Suites.</p> <p>15 MR. ZOURAS: Jim Zouras for the plaintiff.</p> <p>16 MR. GALIN: Matthew Galin for the plaintiff.</p> <p>17 MS. CERAGIOLI: Anna Ceragioli for the</p> <p>18 plaintiff.</p> <p>19 THE VIDEOGRAPHER: Thank you, counsel. Will</p> <p>20 the court reporter please administer the oath.</p> <p>21 (WHEREUPON, the witness was duly</p> <p>22 sworn.)</p> <p>23 THE VIDEOGRAPHER: You may proceed.</p> <p>24</p>	<p style="text-align: right;">Page 8</p> <p>1 to do to make Andrea's life easier. The first</p> <p>2 one is that sometimes you are going to anticipate</p> <p>3 what my question is and want to start giving the</p> <p>4 answer. There will be other instances where I am</p> <p>5 excited to ask my next question and may cut you</p> <p>6 off, but to the extent we can, we both need to</p> <p>7 let the other one finish before we start the next</p> <p>8 question or answer. Okay?</p> <p>9 A. Good.</p> <p>10 Q. Also for Andrea's benefit even though</p> <p>11 we have a videographer, it's important that you</p> <p>12 give your answers orally because the court</p> <p>13 reporter has a difficult time taking down nods of</p> <p>14 the head or uh-huh or uh-uh.</p> <p>15 Is that fair?</p> <p>16 A. Yes.</p> <p>17 Q. Sometimes I speak quickly. Sometimes</p> <p>18 especially given that you are a -- you have an</p> <p>19 area of specialization that I am not familiar</p> <p>20 with. My questions may not make sense to you.</p> <p>21 If at any point you need me to repeat or rephrase</p> <p>22 a question that you don't understand or didn't</p> <p>23 hear, please ask me to do that, and I will be</p> <p>24 happy to repeat it or rephrase. Okay?</p>
<p style="text-align: right;">Page 7</p> <p>1 ROBERT KAESTNER, Ph.D.,</p> <p>2 called as a witness herein, having been first</p> <p>3 duly sworn, was examined and testified as</p> <p>4 follows:</p> <p>5 EXAMINATION</p> <p>6 BY MR. SCHUTTE:</p> <p>7 Q. Could you please state and spell your</p> <p>8 name for the record.</p> <p>9 A. Robert Kaestner, K-A-E-S-T-N-E-R.</p> <p>10 Q. Okay. Dr. Kaestner, do you understand</p> <p>11 that your deposition is being videotaped and</p> <p>12 could be show to the judge or jury in this case?</p> <p>13 A. Yes.</p> <p>14 Q. Okay. Have you ever given a</p> <p>15 deposition before?</p> <p>16 A. No.</p> <p>17 Q. Let me go over the ground rules for</p> <p>18 today then. I am going to ask you a series of</p> <p>19 questions. Andrea, the court reporter, is going</p> <p>20 to make a written transcript. We will also have</p> <p>21 a video transcript that you will have an</p> <p>22 opportunity to review the written transcript and</p> <p>23 make any corrections after we are finished.</p> <p>24 There's a couple things we both need</p>	<p style="text-align: right;">Page 9</p> <p>1 A. Yes.</p> <p>2 Q. If you answer the question though, I</p> <p>3 am going to assume that you understood the</p> <p>4 question. Is that fair?</p> <p>5 A. Yes.</p> <p>6 Q. We will take a break every hour or so,</p> <p>7 but if at any point you need to take a break more</p> <p>8 than frequently, just let me know. The only</p> <p>9 thing that I would ask is that you not take a</p> <p>10 break in between the time when a question is</p> <p>11 pending and when you give the answer. Please</p> <p>12 take a break after the answer. Okay?</p> <p>13 A. Yes.</p> <p>14 Q. Is there any reason, Dr. Kaestner,</p> <p>15 that you could not testify fully and accurately</p> <p>16 today?</p> <p>17 A. No.</p> <p>18 Q. I am going to hand you what we have</p> <p>19 marked as Exhibit 17 which is a -- I am going to</p> <p>20 ask you to review that and tell me if that's a</p> <p>21 copy of the report that you drafted in this</p> <p>22 matter.</p> <p>23</p> <p>24</p>

<p style="text-align: right;">Page 10</p> <p>1 (WHEREUPON, a certain document 2 was marked Deposition Exhibit No. 3 17, for identification, as of 4 2/21/20.) 5 BY THE WITNESS: 6 A. It seems to be in order. Thank you. 7 BY MR. SCHUTTE: 8 Q. You understand, Dr. Kaestner, that you 9 are being offered as an expert on behalf of the 10 plaintiff Wacker Drive Executive Suites in this 11 lawsuit? 12 A. Yes. 13 Q. Okay. If I refer to Wacker Drive 14 Executive Suites as WDES today, will you -- is 15 that okay with you? 16 A. Yes. 17 Q. You understand what I mean? 18 A. Yes. 19 Q. Okay. You understand that your expert 20 opinion has been offered to the Court as a basis 21 for doing a class-wide damages calculation? 22 A. Yes. 23 Q. Did you have an opportunity to review 24 your report Exhibit 17 in preparation for your</p>	<p style="text-align: right;">Page 12</p> <p>1 signature that's just as good as if you had 2 signed it with a pen? 3 A. Yes. 4 Q. When were you retained, Dr. Kaestner, 5 by counsel in this matter? 6 A. I don't know exactly the date but 7 November 2019. 8 Q. Had you -- did you have any 9 familiarity with this lawsuit prior to the time 10 you were retained in November of 2019? 11 A. No. 12 Q. Do you have a written agreement with 13 plaintiff's counsel that governs the terms of 14 your expert engagement? 15 A. No. 16 Q. Counsel has -- or I guess your report 17 states that you are being paid \$650 an hour for 18 your work on the matter? 19 A. That's correct. 20 Q. Is the -- is there a different amount 21 you are charging for your testimony as opposed to 22 work drafting the report? 23 A. No. 24 Q. Approximately how many hours have you</p>
<p style="text-align: right;">Page 11</p> <p>1 deposition today? 2 A. Yes. 3 Q. Did you see -- as you reviewed it, did 4 you see any errors that need to be corrected? 5 A. No. 6 Q. Did you actually physically prepare 7 the report? 8 A. Yes. 9 Q. Okay. Did anyone assist you, not 10 counsel, but anyone on your behalf? 11 A. No. 12 Q. When you drafted your report, did you 13 choose your words carefully? 14 A. Yes. 15 Q. Okay. And when you prepared for your 16 deposition today by among over things reviewing 17 your report, did you see any words in your report 18 that you would like to change? 19 A. No. 20 Q. And is it your signature that appears 21 electronically on page 9 of the report? 22 A. Yes. 23 Q. And even though that's an electronic 24 signature, is it your testimony that that's a</p>	<p style="text-align: right;">Page 13</p> <p>1 worked on this matter? 2 A. 15. 3 Q. 15? 4 A. Yes. 5 Q. Have you submitted a bill for the 15 6 hours that you worked on this matter? 7 A. I have. 8 Q. Have you been paid? 9 A. Yes. 10 Q. Was the payment made to you personally 11 or was it made to one of your employers? 12 A. Personally. 13 Q. Okay. The report on page 1 has a date 14 of January 17th of 2020. Do you see that in the 15 upper left? 16 A. Yes. 17 Q. Okay. And then on page 9 next to your 18 signature, it has a date of January 31st of 2020? 19 A. Yes. 20 Q. Which of those dates or maybe neither 21 of them reflects the time when you finalized your 22 report? 23 A. I will say January 31st, but that's to 24 the best of my recollection.</p>

<p style="text-align: right;">Page 14</p> <p>1 Q. Do you know what the significance of 2 January 17th on page 1 of the report is?</p> <p>3 A. I do not.</p> <p>4 Q. Okay. Is that something you typed?</p> <p>5 A. I don't remember.</p> <p>6 Q. Okay. I should have asked this when I 7 was asking about your retention, but who was it 8 that retained you? Was it one of the law firms 9 that's involved on behalf of the plaintiff?</p> <p>10 A. Yes.</p> <p>11 Q. Which law firm?</p> <p>12 A. Foster PC.</p> <p>13 Q. You wrote on page 1 of your report at 14 the bottom, and I'll read it for the record: "In 15 this report, I provide evidence related to 16 whether mandating the use of union labor to move 17 in and out of, and renovate commercial office 18 space in downtown Chicago affects the cost of 19 such activities."</p> <p>20 Did I read that correctly?</p> <p>21 A. Yes.</p> <p>22 Q. And those were words that you typed?</p> <p>23 A. Yes.</p> <p>24 Q. Is that an accurate statement of what</p>	<p style="text-align: right;">Page 16</p> <p>1 cost of labor between union and non-union labor 2 in occupations used to move into and renovate 3 office space in downtown Chicago.</p> <p>4 Q. But that opinion you are offering 5 about the differences between union and non-union 6 is not in the context of the union-only rule that 7 plaintiffs have alleged exists in downtown 8 Chicago?</p> <p>9 MR. FOSTER: I object to the form of the 10 question. You can answer.</p> <p>11 BY THE WITNESS:</p> <p>12 A. The context is that there is different 13 costs of labor between -- for union and non-union 14 services, and that I think is relevant to.</p> <p>15 BY MR. SCHUTTE:</p> <p>16 Q. Right, and I understand that. I am 17 asking about this specific question where you 18 wrote and told the judge that you are offering an 19 opinion as to whether mandating the use of union 20 labor affects the cost of activities of 21 renovating commercial office space in downtown 22 Chicago, and my question to you is you are not 23 actually offering an opinion between the 24 connection of a union-only rule and the</p>
<p style="text-align: right;">Page 15</p> <p>1 you are intending to do in your report with 2 respect to this litigation?</p> <p>3 A. I think what I intend to do is exactly 4 what I say. What I do is I -- I can read it. I 5 estimate the difference in wages between union 6 and non-union workers in occupations typically 7 used to move into and out of renovated commercial 8 space in downtown Chicago. That's what I intend 9 to do.</p> <p>10 Q. Okay. But I am asking specifically 11 about that sentence where you told the Court that 12 you are in this report providing evidence 13 relating to whether mandating the use of union 14 labor affects the cost of activities.</p> <p>15 That is not actually what -- you are 16 not opining about the effect of a so-called 17 union-only rule on the difference between union 18 and non-union labor, are you?</p> <p>19 MR. FOSTER: I object to the form of the 20 question. You can answer.</p> <p>21 THE WITNESS: I can answer?</p> <p>22 MR. FOSTER: You can answer.</p> <p>23 BY THE WITNESS:</p> <p>24 A. I am estimating the differences in the</p>	<p style="text-align: right;">Page 17</p> <p>1 differences you say exist between the cost of 2 union and non-union labor, are you?</p> <p>3 MR. FOSTER: Objection, that's been asked 4 and answered. This is your fourth attempt.</p> <p>5 MR. SCHUTTE: It hasn't begun answered.</p> <p>6 MR. FOSTER: Okay. Okay. He answered it, 7 but if he wants to answer it -- he can answer it 8 again.</p> <p>9 BY THE WITNESS:</p> <p>10 A. Again, I estimate the difference 11 between the cost of union and non-union labor, 12 and that's relevant in a context where union 13 labor is required to be used because it --</p> <p>14 BY MR. SCHUTTE:</p> <p>15 Q. Okay. Can you show me in your report 16 where you have a discussion of a connection 17 between the differences between union and 18 non-union wages and the allegation by plaintiffs 19 that unions are mandated in downtown Chicago?</p> <p>20 A. I don't have it in my report.</p> <p>21 Q. And, again, because -- and I am not 22 trying to fight with you. I just want to 23 understand the scope of your opinion. We will 24 talk at great length today about the opinion you</p>

<p style="text-align: right;">Page 18</p> <p>1 have offered that there's a difference in  2 downtown Chicago between the cost of union and  3 non-union labor.  4 My only question and specifically  5 pointing to what you wrote in the first page is  6 none of your opinions are about whether that  7 difference is caused by the union-only rule;  8 isn't that correct?  9 MR. FOSTER: Objection, asked and answered.  10 The fourth time you are asking it. It seems like  11 the same question. You can answer.  12 BY THE WITNESS:  13 A. That's correct.  14 BY MR. SCHUTTE:  15 Q. You also do not opinion, do you,  16 Dr. Kaestner, on the difference in union versus  17 non-union wages specific to the Chicago Loop?  18 A. That's correct. What I estimate is  19 the difference between union and non-union wages  20 in the Chicago metropolitan area defined in the  21 report as the -- as the Chicago-Naperville-Joliet  22 area that's defined by the U.S. Government. This  23 is the smallest area that can be used to  24 represent Chicago.</p>	<p style="text-align: right;">Page 20</p> <p>1 right now, but I do want to know who was at that  2 meeting.  3 A. The counsel present here today.  4 Q. All four attorneys?  5 A. Yes.  6 Q. Where did that meeting occur?  7 A. In these premises.  8 Q. Other than your report, did you review  9 any other documents to prepare for your  10 deposition today?  11 A. No.  12 Q. If we -- I think you testified that  13 you don't recall -- well, let me just ask you  14 again because I don't remember what you said.  15 Is it your testimony that you think  16 you completed your report on January 31st which  17 is the date on the signature page?  18 MR. FOSTER: Objection. Asked and answered.  19 BY MR. SCHUTTE:  20 Q. Go ahead and answer.  21 A. Yes.  22 Q. Okay. Did you -- other than the one  23 hour you spent with counsel and the time you  24 spent reviewing your report to prepare for your</p>
<p style="text-align: right;">Page 19</p> <p>1 Q. Is there any work that you have done  2 in connection with your retention by counsel in  3 this case that is not covered in your report?  4 In other words, did you form any  5 opinions about the case that you do not include  6 in your report?  7 A. No.  8 Q. Do you anticipate that there is  9 additional work that you will be doing on this  10 matter?  11 A. I can't anticipate.  12 Q. Okay. What did you do to prepare for  13 your deposition today?  14 A. Reviewed my report.  15 Q. Anything else?  16 A. No.  17 Q. Did you meet with counsel?  18 A. I did.  19 Q. For how long?  20 A. One hour.  21 Q. And when was that?  22 A. Beginning of this week so Tuesday.  23 Q. Who was with -- again, I don't want to  24 talk about what you talked about, at least not</p>	<p style="text-align: right;">Page 21</p> <p>1 deposition, have you done any other work on this  2 matter between January 31st of 2020 and today?  3 A. No.  4 Q. Is the hour that you spent -- strike  5 that.  6 How much time did you spend reviewing  7 your report in preparation for your deposition  8 today?  9 A. An hour and a half.  10 Q. Okay. So of the 2.5 hours, one hour  11 meeting with counsel --  12 A. No, that was -- excuse me.  13 Q. That's okay.  14 A. That's the time I reviewed my report.  15 Q. When you were with counsel?  16 A. Yes.  17 Q. Okay. So is the hour and a half that  18 you testified that you spent reviewing your  19 report and meeting with counsel part of the 15  20 hours that you've spent on this case?  21 A. No.  22 Q. Is the 15 hours what you spent  23 actually preparing your report?  24 A. Yes.</p>



<p style="text-align: right;">Page 22</p> <p>1 Q. And then you have 1.5 hours since 2 then? 3 A. Yes. 4 Q. Okay. Have we talked about everything 5 you did to prepare for your deposition today, met 6 with counsel and reviewed your report? 7 A. Yes. 8 Q. Okay. Have you ever served as an 9 expert in a lawsuit before? 10 A. No. 11 Q. And by lawsuit, I mean that broadly 12 which would include an arbitration or a 13 mediation. 14 A. The answer is still no. 15 Q. Okay. Have you ever testified at 16 trial for any reason whether it's a personal 17 lawsuit or any other capacity? 18 A. No. 19 Q. I take it then you have never 20 submitted an expert report in any case in federal 21 court? 22 A. Correct. 23 Q. Prior to this case, were you familiar 24 with WDES?</p>	<p style="text-align: right;">Page 24</p> <p>1 Q. What classes do you currently teach? 2 A. I teach a course in cost benefit 3 analysis and -- 4 Q. How very appropriate for the 5 University of Chicago. 6 A. And micro-economics. 7 Q. Do you teach any classes on labor 8 economics? 9 A. I do not. 10 Q. Okay. Is the position you have at the 11 University of Chicago a tenure track position? 12 A. It is not. 13 Q. Okay. You are also according to the 14 documents you've provided to us and some other 15 things we have looked at a research associate at 16 the National Bureau of Economic Research? 17 A. Correct. 18 Q. What is the nature of your work at the 19 National Bureau of Economic Research? 20 A. That's a non-profit and non-partisan 21 organization, professional organization of 22 economists. It's very prominent, internationally 23 known, and I am an affiliate there where I 24 conduct research along with other people.</p>
<p style="text-align: right;">Page 23</p> <p>1 A. No. 2 Q. Prior to this case, were you familiar 3 with Larry Grossman? 4 A. No. 5 Q. Have you ever met Mr. Grossman? 6 A. No. 7 Q. Prior to this case, were you familiar 8 with Amy Grossman? 9 A. No. 10 Q. Have you ever met Ms. Grossman? 11 A. No. 12 Q. You currently, according to your CV 13 materials that we have seen and your report, are 14 a research professor at the University of 15 Chicago. 16 A. Correct. 17 Q. Can you tell the ladies and gentlemen 18 of the jury and the judge what a research 19 professor at the University of Chicago does? 20 A. In my position there I conduct 21 research, teach, and advise students. 22 Q. And that's in the Harris School of 23 Public Policy? 24 A. Correct.</p>	<p style="text-align: right;">Page 25</p> <p>1 Q. I'm sorry? 2 A. Along with other economists. It's an 3 unpaid position. 4 Q. Okay. You anticipated my next 5 question. 6 So your -- your -- you earn your 7 living with your work as a research professor at 8 the University of Chicago, but you also do work 9 as a research associate uncompensated at the 10 National Bureau of Economic Research? 11 A. That's incorrect. I do research. I 12 conduct research that is for my professional 13 activities paid for by the University of Chicago, 14 and that research -- it is just an affiliation of 15 a group of economists the National Bureau of 16 Economic Research. So they don't pay me. They 17 don't direct my research. 18 Q. I see. I am going to go ahead and ask 19 this question, but maybe given what you just 20 said, it doesn't make any sense. 21 Is there a way to estimate the amount 22 of time you spend in your role as a research 23 professor at the University of Chicago versus at 24 the National Bureau of Economic Research or do</p>

7 (Pages 22 - 25)



<p style="text-align: right;">Page 26</p> <p>1 they overlap?</p> <p>2 A. As part of my contract with the</p> <p>3 university that my time is accounted for by my</p> <p>4 compensation at the university, and so there's no</p> <p>5 conflict or overlap.</p> <p>6 Q. Okay.</p> <p>7 A. It's a -- the NBER is an honorific</p> <p>8 appointment that provides some benefits in terms</p> <p>9 of dissemination of my research.</p> <p>10 Q. I see. Okay. Thank you. That's very</p> <p>11 helpful.</p> <p>12 MR. SCHUTTE: Could we mark this, Andrea, as</p> <p>13 18, please.</p> <p>14 (WHEREUPON, a certain document</p> <p>15 was marked Deposition Exhibit No.</p> <p>16 18, for identification, as of</p> <p>17 2/21/20.)</p> <p>18 BY MR. SCHUTTE:</p> <p>19 Q. Dr. Kaestner, we have marked as</p> <p>20 Exhibit 18 a page that we printed off of the</p> <p>21 Harris School of Public Policy website at the</p> <p>22 University of Chicago.</p> <p>23 As you can see in the lower right</p> <p>24 corner, we pulled it down and printed it this</p>	<p style="text-align: right;">Page 28</p> <p>1 Q. Okay. In your report at page 1, you</p> <p>2 refer to that you have an extensive record of</p> <p>3 scholarly publications in labor economics?</p> <p>4 A. That's correct.</p> <p>5 Q. Can you tell the judge and the jury</p> <p>6 what you mean by labor economics?</p> <p>7 A. Labor economics is a study of labor</p> <p>8 markets, the supply of labor to various markets,</p> <p>9 the demand for labor, the determination of wages</p> <p>10 in labor markets. That would be a thumbnail</p> <p>11 sketch.</p> <p>12 MR. SCHUTTE: Okay. Let's mark this as No.</p> <p>13 19, please, Andrea.</p> <p>14 (WHEREUPON, a certain document</p> <p>15 was marked Deposition Exhibit No.</p> <p>16 19, for identification, as of</p> <p>17 2/21/20.)</p> <p>18 BY MR. SCHUTTE:</p> <p>19 Q. We have handed you, Dr. Kaestner, and</p> <p>20 marked as Exhibit 19 a document that I will</p> <p>21 represent to you that I also pulled off of the</p> <p>22 Harris School of Public Policy website, and I am</p> <p>23 going to ask you to the best of your knowledge,</p> <p>24 is this a current copy of your CV?</p>
<p style="text-align: right;">Page 27</p> <p>1 week on Tuesday I think.</p> <p>2 First of all, have you ever seen this</p> <p>3 document or this web page before?</p> <p>4 A. I have seen the web page.</p> <p>5 Q. Is this something that you were</p> <p>6 involved in drafting?</p> <p>7 A. Yes.</p> <p>8 Q. Okay. The third paragraph states, and</p> <p>9 I'll read it into the record: "Dr. Kaestner's</p> <p>10 areas of research interests are the economic and</p> <p>11 social determinants of health, health demography,</p> <p>12 and health, labor and social policy evaluation."</p> <p>13 Is that an accurate statement of your</p> <p>14 area of research interest as you sit here today?</p> <p>15 A. It's not a complete assessment.</p> <p>16 Q. What are the other areas that you have</p> <p>17 of research interest?</p> <p>18 A. Labor economics.</p> <p>19 Q. Is there a reason why you did not</p> <p>20 include labor economics in the bio or information</p> <p>21 posted about you on the Harris School of Public</p> <p>22 Policy website?</p> <p>23 A. In my opinion it's contained under</p> <p>24 labor, the word labor and policy evaluation.</p>	<p style="text-align: right;">Page 29</p> <p>1 A. It seems current.</p> <p>2 Q. Okay. One thing -- it's a little bit</p> <p>3 like This is Your Life.</p> <p>4 One thing I noticed looking at a prior</p> <p>5 copy of your CV that was available on the</p> <p>6 internet is that you had a stint as a consultant</p> <p>7 at the Federal Reserve Bank of Chicago; is that</p> <p>8 correct?</p> <p>9 A. Correct.</p> <p>10 Q. Is there a reason why that is not --</p> <p>11 perhaps I am just missing it. I don't see that</p> <p>12 listed on Exhibit 19?</p> <p>13 A. I am no longer a consultant there.</p> <p>14 Q. Okay. Is there a reason why you did</p> <p>15 not leave that on your CV as a prior position</p> <p>16 that you held in the professional -- in your</p> <p>17 professional experience?</p> <p>18 A. No, I didn't think it was important.</p> <p>19 Q. Okay. Can you tell us why it was that</p> <p>20 you decided to leave your work as a professor at</p> <p>21 the University of Illinois in the Institute of</p> <p>22 Government and Public Affairs and join the</p> <p>23 University of Chicago?</p> <p>24 A. I thought it was a better opportunity.</p>

8 (Pages 26 - 29)

<p style="text-align: right;">Page 30</p> <p>1 Q. Okay. Were you a tenured professor at 2 the University of Illinois? 3 A. Yes, I was a tenured full professor. 4 Q. Let's do it this way. Your report 5 lists at the back page 13 in Appendix B the 6 articles you published from 2010 to present? 7 A. Yes. 8 Q. Okay. Would you be able to look 9 through that, and among the 47 articles that 10 are -- excuse me -- 50 articles that are listed, 11 identify which articles you believe are covered 12 by -- within the field of labor economics? 13 A. Would you like me to go through each 14 one and -- 15 Q. Yeah, I would just like you to go 16 through the list and tell me by number which of 17 these you think are articles that are in the area 18 of labor economics as opposed to, for example, 19 economic and social determinants of health, 20 health demography, et cetera. 21 So specifically I am looking for 22 articles that you think are articles that you 23 have written within the field of labor economics 24 as you have used that term in your report and as</p>	<p style="text-align: right;">Page 32</p> <p>1 which is your full CV which I think includes all 2 of your articles, not limited to the last ten 3 years, that would be fine with me. 4 A. Well, let's start -- number 120, 5 number 116, number 86, number 75. That would be 6 it. 7 Q. Have you ever written any articles or 8 been published in any forum on the topic of union 9 versus non-union wages? 10 A. Not directly. 11 Q. How about indirectly? 12 A. In some of those articles I have 13 referred to that would. 14 Q. Okay. Prior to the -- your engagement 15 in November or so of 2019 in this matter, have 16 you done research into differences between union 17 and non-union wages? 18 A. No. 19 Q. Have you ever written any articles 20 that are negative about unions? 21 A. No. 22 Q. Have you written any articles that are 23 positive about unions? 24 A. I don't write articles that are</p>
<p style="text-align: right;">Page 31</p> <p>1 you have defined it for us today. 2 A. Number 3, number 15, number 18, number 3 19, number 22, number 25, number 29, number 33, 4 number 38, number 39, number 43. So of the -- of 5 those 50, those would be the ones. 6 Q. Are there any of the 50 that you can 7 identify that are articles that specifically 8 focus on labor unions? 9 A. Can you clarify with specifically 10 focus? 11 Q. That's a fair -- that's a fair 12 question. 13 Can you identify among the 50 articles 14 any that have to do with labor unions? 15 A. Number 25. 16 Q. Any others? 17 A. Not on this list. That's a -- can 18 I -- that's a partial list of my publication 19 record. That's the last ten years. 20 Q. Okay. 21 A. I have 80 more publications. 22 Q. Of those 80, do you recall any are -- 23 that concern the topic of labor unions? 24 And if you want to refer to Exhibit 19</p>	<p style="text-align: right;">Page 33</p> <p>1 negative or positive. I write articles that 2 reflect the science and differences between 3 unions. I don't put a positive or negative 4 assessment. That's not what I do. 5 Q. Okay. Fair enough. That's a fair 6 enough answer. 7 Do you have -- have you ever written 8 any articles about the process for submitting and 9 analyzing bids for renovation projects in the 10 Chicago Loop? 11 A. No. 12 Q. Other than the articles you have 13 already identified, are there any articles in 14 your -- the CV list of 130 articles you have 15 written along with books that relate to the 16 subject matter that you are testifying about in 17 this litigation? 18 A. Yeah, any article that's written about 19 wages, that would be relevant because the 20 methodology and the approach I use is a very 21 standard approach applied to any analysis of 22 wages. 23 Q. In your opinion is the arena of 24 union -- unions and the effect of unions on wages</p>

<p style="text-align: right;">Page 34</p> <p>1 something that makes that issue unique from wages 2 generally? 3 A. I don't understand the question. 4 Q. I will withdraw it and move on. I 5 will come back to that. 6 You wrote in your report at page 1 7 quote: "I am a qualified expert witness in this 8 matter." 9 What is the basis of that statement? 10 A. I have a Ph.D. in Economics. My area 11 of specialization was labor economics and applied 12 econometrics. I have published articles in the 13 top journals in the field of labor economics 14 including the Journal of Labor Economics, 15 Industrial and Labor Relations Review, Journal of 16 Human Resources, Journal of Human Capital, and 17 that would be. 18 Q. Is it fair to say that labor economics 19 is a secondary interest of yours with the area of 20 the economic and social determinants of health 21 and health demography being the primary area of 22 your research focus? 23 A. No. 24 Q. Have you ever worked in construction?</p>	<p style="text-align: right;">Page 36</p> <p>1 reviewed specific to this case? 2 A. Yes. 3 Q. And I apologize if I have already 4 asked you this, but have you reviewed any 5 documents related to this case since you 6 submitted your report on January 31st of 2020? 7 A. No. 8 Q. How did you choose those two documents 9 as the documents that you would review? 10 A. I was provided them by counsel. 11 Q. All right. Were there other documents 12 that you wanted to review but were not given 13 access to? 14 A. No. 15 Q. Do you have an understanding as to why 16 those were the documents that were provided to 17 you? 18 A. No. 19 Q. I am going to hand you what we have 20 marked previously in this case, Dr. Kaestner, as 21 Exhibit 10 which is the First Amended Class 22 Action Complaint in this lawsuit, and is that the 23 document that you referred to in your complaint 24 as the Amended Class Action Complaint?</p>
<p style="text-align: right;">Page 35</p> <p>1 A. Yes. 2 Q. When? 3 A. When I was a young gentleman. 4 Q. And where was that? Was that in 5 Chicago? 6 A. No. 7 Q. Have you ever been a member of a 8 union? 9 A. Yes. 10 Q. What union? 11 A. Professors Union when I was a faculty 12 member. 13 Q. The work that you did in the 14 construction industry, could you describe that 15 generally? 16 A. I was a laborer. 17 Q. Okay. The report identifies that the 18 only two documents that you reviewed in 19 connection with forming your opinions in this 20 matter are the First Amended Complaint and WDES's 21 Response to the First Set of Interrogatories 22 that's on page 1. 23 Is that an accurate statement that 24 those are the only two documents that you</p>	<p style="text-align: right;">Page 37</p> <p>1 A. Unless the counsel objects, I would 2 say, yes. I mean, as far as I know, yes. 3 Q. Okay. When did you review the First 4 Amended Complaint? 5 A. Prior to writing the report or... 6 Q. When did you start writing the report? 7 A. Sometime after November or -- 2019. 8 Q. How -- 9 A. Can I correct that? 10 Q. Of course. 11 A. I started working on the analysis that 12 was part of the report. 13 Q. Okay. The actual physical act of 14 drafting, could you estimate for us when you 15 started that? 16 A. Late December. 17 Q. Okay. Of the 15 hours that you said 18 you spent on drafting the report, how much of 19 that time did you spend reviewing the First 20 Amended Complaint? 21 A. An hour. 22 Q. Okay. Did you review the entire 23 document? 24 A. Quickly, not in detail.</p>

10 (Pages 34 - 37)

<p style="text-align: right;">Page 38</p> <p>1 Q. Okay. What was the purpose for you 2 reviewing the First Amended Complaint? 3 A. I don't know what you mean the 4 purpose. Why I read the document? 5 Q. Yes. 6 A. To become familiar with the case. 7 Q. Did you rely on the allegations in the 8 First Amended Complaint in forming your opinion? 9 A. No. 10 Q. Did you see anything when you reviewed 11 the First Amended Complaint that you disagreed 12 with? 13 A. I didn't take an agree or disagree 14 with anything in the complaint. It wasn't -- I 15 didn't see that was my purview to agree or 16 disagree. 17 Q. You were reviewing the complaint to 18 get background on the case? 19 A. That would be a reasonable way to 20 frame it, yes. 21 Q. If I ask you to take a look at -- in 22 the complaint at paragraphs 8 and 9, you 23 understand, Dr. Kaestner, do you not, that the 24 allegations that are being made in the complaint</p>	<p style="text-align: right;">Page 40</p> <p>1 the plaintiffs are seeking to certify. 2 Do you see that? 3 A. I do see it. 4 Q. And do you understand that the area 5 that the plaintiffs alleged in which this 6 union-only rule existed is in the Chicago Loop? 7 A. Again, I understand when you refer to 8 the Chicago Loop what is the definition. 9 Q. And what I am specifically asking, 10 sir, is if you understand that the allegations in 11 this case about there being a union-only rule and 12 that union-only rule harming WDES and similarly 13 situated tenants is limited to the Chicago Loop? 14 A. I have read the complaint, and if 15 that's what the complaint says, then... 16 Q. Well, we're going to -- I don't want 17 to hide the ball from you. We are going to talk 18 about this extensively later, but your analysis 19 is limited -- we will talk about what it means 20 but the Chicago, Joliet, and Naperville 21 metropolitan area, correct? 22 A. That's -- not the entire analysis, but 23 that is the -- an important part of it. 24 Q. Well, the other part of your analysis</p>
<p style="text-align: right;">Page 39</p> <p>1 have to do with a so-called union-only rule that 2 the plaintiff has alleged exists in the Chicago 3 Loop? 4 A. From reading the complaint, that's 5 what I read. 6 Q. Okay. And you understand that when 7 the plaintiffs use the term "Chicago Loop," it is 8 limited to geographically as it says in paragraph 9 9, the area bounded on the east by Michigan 10 Avenue, on the north and west by the Chicago 11 River, and on the south by Congress Parkway? 12 A. I will accept the definition provided 13 in the complaint. 14 Q. Okay. And if we use -- if I use the 15 term Chicago Loop today during your deposition to 16 mean the definition of Chicago Loop that the 17 plaintiff has asserted in this case, is that okay 18 with you? 19 A. I don't -- when you refer to it, I 20 will understand what you mean. 21 Q. That's perfectly good, thank you, and 22 I also asked you to take a look at paragraph 42 23 of the complaint. It actually uses the term 24 Chicago Loop in the definition of the class that</p>	<p style="text-align: right;">Page 41</p> <p>1 is to Cook County, correct? 2 A. Correct. 3 Q. And both of those are different than 4 the term Chicago Loop as the plaintiff has 5 defined it, correct? 6 A. By those definitions, yes. 7 Q. Did you have any role, Dr. Kaestner, 8 in drafting paragraphs 29 through 31 of the 9 complaint? 10 A. No. 11 Q. Do you have any reason to think that 12 the allegations in paragraph 30 is -- are correct 13 or incorrect? 14 A. I am not sure what you want me to 15 comment on or the question exactly. 16 Q. Okay. I will rephrase it. That's 17 fair. 18 Paragraph 30, as I read it, is an 19 allegation about the differences in wages for 20 union versus non-union workers in the Chicago 21 metropolitan area. 22 Would you agree with that? 23 A. I am going to read what it says so I 24 will interpret it as it's written. So it says:</p>

<p style="text-align: right;">Page 42</p> <p>1 The differences for carpenters -- and I think the  2 differences are referring to the differences in  3 union and non-union workers for carpenters for  4 non-union is 32.61 versus 46.35, and it's  5 referring to one number from the Bureau of Labor  6 Statistics, another from the Cook County  7 prevailing wages.  8 I have no reason to expect that those  9 aren't the numbers that the Bureau of Labor  10 Statistics publishes or that the Cook County  11 prevailing wage publishes by the Illinois  12 Department of Labor, and so that's how I would  13 interpret those numbers as those numbers come  14 from those sources and, as far as I know, are --  15 were accurate numbers.  16 Q. Is the Bureau of Labor Statistics  17 documents or information that's referenced in  18 paragraph 30 the same as the Current Population  19 Survey information that you used as part of your  20 analysis?  21 A. I do not know where that number came  22 from. So I can't answer that.  23 Q. Where the number referred to in --  24 A. 32.61, yes. I didn't write this.</p>	<p style="text-align: right;">Page 44</p> <p>1 "Those tenants preferring to use union labor have  2 also been overcharged because the labor market  3 for contracting services has been closed to  4 effective competition, meaning union labor is  5 supercompetitively priced; that is, above the  6 price it would be if the union-only rule were not  7 in place."  8 Are you offering any opinions in this  9 case about that allegation that I just read into  10 the record?  11 A. Can you explain the allegations one by  12 one for me that you are making?  13 Q. I am not making the allegations --  14 A. Well, I mean there's more than one  15 statements and conclusions here.  16 Q. Okay. Let me try it this way. The  17 opinion you are offering -- and we will talk  18 about that extensively -- is the differences in  19 wages in the Chicago metropolitan area between  20 union and non-union workers either in moving or  21 in renovation of commercial properties, correct?  22 A. That is correct.  23 Q. Okay. You are not offering an  24 opinion -- any opinion in your report anyway</p>
<p style="text-align: right;">Page 43</p> <p>1 Q. Okay. But in my initial question --  2 let me make sure I understand your testimony.  3 Your testimony is you have no opinion  4 one way or the other whether the allegations in  5 paragraph 30 are true or false. You didn't look  6 into that?  7 A. I didn't assess whether paragraph 30  8 was correct.  9 Q. Did the allegations in paragraph 30  10 inform the way that you decided to do your  11 analysis?  12 A. No.  13 Q. Have you discussed the analysis that  14 someone did -- strike that.  15 Do you know who did the analysis in  16 paragraph 30 to be able to make these  17 allegations?  18 A. No.  19 Q. Did you rely on the allegations in  20 paragraph 30 in forming your opinion?  21 A. No.  22 Q. Paragraph 31 I want to focus your  23 attention to the sentence at the top of page 7  24 that says -- I will read it into the record:</p>	<p style="text-align: right;">Page 45</p> <p>1 about whether the labor market for contracting  2 services has been closed to effective competition  3 meaning that union labor is super competitively  4 priced. That's not something that you offer an  5 opinion about in your report, right?  6 A. My report addresses the question of  7 whether there are differences in the cost of  8 union versus non-union labor.  9 Q. And so the answer to my question is,  10 no, that's not an issue that you have addressed  11 in your report?  12 A. I gave my answer.  13 Q. I will see if the Judge thinks that  14 you answered the question or not.  15 Did you have any role in drafting  16 paragraph 59 of the complaint?  17 A. I had no role in drafting paragraph 59  18 or any other paragraph in the complaint.  19 Q. Do you know how the allegations and  20 the calculations in particular in paragraph 59A  21 were arrived at?  22 A. No, I do not.  23 Q. What about the allegations in 59B?  24 A. As I stated, I have no idea of who</p>



<p style="text-align: right;">Page 46</p> <p>1 wrote or did the analysis or what the analysis 2 concluded in the complaint besides what I have 3 read. 4 Q. You are not offering any opinion today 5 are you, Dr. Kaestner, on the specific damages 6 that WDES suffered as a result of the alleged 7 union-only rule, right? 8 A. Correct. 9 Q. And you are not offering any opinion 10 today as to what any particular absent class 11 member what damages that each entity suffered as 12 a result of this alleged union-only rule, 13 correct? 14 A. That's correct. 15 Q. I am going to hand you what we have 16 previously -- do you mind if -- I am not going to 17 remark this. This was Exhibit 1 that we have 18 used previously. We can substitute in the one 19 with the sticker. 20 MR. FOSTER: Okay. Sure, that's fine. 21 BY MR. SCHUTTE: 22 Q. Okay. I am going to hand you what we 23 have previously marked as -- it was marked as 24 Grossman Exhibit 1 which is the Plaintiff Wacker</p>	<p style="text-align: right;">Page 48</p> <p>1 interrogatory responses around the same time that 2 you reviewed Exhibit 10 the First Amended 3 Complaint? 4 A. That seems a reasonable assumption, 5 yes. 6 Q. Have you reviewed the -- strike that. 7 Are you aware that WDES has submitted 8 a supplemental response to Interrogatory 4 that 9 supplements the response previously given that 10 you looked at in Exhibit 1? 11 A. I am not aware of that. 12 Q. Okay. Is that something you feel like 13 you need to see in order to ensure that your 14 opinion is accurate? 15 A. No. 16 Q. Did you review any deposition 17 transcripts? 18 A. No. 19 Q. Did you review any documents relating 20 to work that was performed at 125 South Wacker at 21 the WDES location in 2014 or 2017? 22 A. No. 23 Q. Have you reviewed the plaintiff's 24 motion for class certification?</p>
<p style="text-align: right;">Page 47</p> <p>1 Drive Executive Suites Response to Defendant's 2 First Set of Interrogatories. 3 My first question for you, 4 Dr. Kaestner, is that the other document that you 5 reviewed that is mentioned in page 1 of your 6 report? 7 A. Yes. 8 Q. Okay. How much time did you spend 9 reviewing this Exhibit 1? 10 A. Very short amount of time, cursory 11 review. 12 Q. Why did you review it? 13 A. To get background information. 14 Q. Okay. Did anything in Exhibit 1 -- 15 strike that. 16 Did you rely on anything in Exhibit 1 17 in forming your opinion? 18 A. No. 19 Q. Did you review Exhibit 1 around the 20 same time that you reviewed the First Amended 21 Complaint which is Exhibit 8 I think or 10 -- let 22 me rephrase that question. Let me rephrase that 23 question. 24 Did you review Exhibit 1 WDES's</p>	<p style="text-align: right;">Page 49</p> <p>1 A. Is it one of these documents, no. 2 Q. Okay. And I think I asked you this 3 before, but let's just close it out. 4 Have you had any contacts at all with 5 Larry Grossman or Amy Grossman? 6 A. No. 7 MR. FOSTER: Objection, asked and answered. 8 You can answer. 9 BY MR. SCHUTTE: 10 Q. On page 3 of your report -- 11 A. Can I clarify which report? 12 Q. Oh, sorry. Exhibit No. 17, your 13 report. 14 A. Okay. Thank you. 15 Q. On page 3, again, I want to cover this 16 sort of at a high level now but come back to it 17 in more detail, you write -- at the paragraph 18 just under the heading B you write in discussing 19 the occupations that were selected for your 20 analysis, and you say -- and I will read it into 21 the record: "These occupations were selected 22 based on experience of the plaintiff and come 23 from occupations classified by the U.S. Bureau of 24 the Census."</p>

<p style="text-align: right;">Page 50</p> <p>1 How did you obtain the information</p> <p>2 that you -- well, strike that.</p> <p>3 What did you mean when you wrote "were</p> <p>4 selected based on experience of the plaintiff"?</p> <p>5 A. Counsel gave me a list of occupations,</p> <p>6 and I used that as a starting point, and then I</p> <p>7 went to the Bureau of Labor Statistics or the</p> <p>8 census and found occupations that I thought were</p> <p>9 appropriate for the tasks of moving and</p> <p>10 renovating office space in Chicago, and that's</p> <p>11 how I chose them.</p> <p>12 Q. What list of occupations does</p> <p>13 plaintiff counsel provide to you?</p> <p>14 A. I don't know exactly what the list</p> <p>15 was. It was things like carpenter, painter.</p> <p>16 Q. Do you have a copy of that what was</p> <p>17 provided to you?</p> <p>18 A. I do not.</p> <p>19 Q. Do you have a copy in your records</p> <p>20 somewhere?</p> <p>21 A. I do not.</p> <p>22 Q. So there was a document that they</p> <p>23 provided to you -- did you rely on that document</p> <p>24 to form your opinion?</p>	<p style="text-align: right;">Page 52</p> <p>1 testimony that when you wrote that these</p> <p>2 occupations were selected based on experience of</p> <p>3 the plaintiff, what you are referring to is a</p> <p>4 list of occupations provided to you by</p> <p>5 plaintiff's counsel?</p> <p>6 A. Yes.</p> <p>7 Q. Okay. You don't know anything about</p> <p>8 the experience of WDES with respect to these</p> <p>9 occupations, correct?</p> <p>10 A. That's correct.</p> <p>11 Q. Can I ask you about the references</p> <p>12 section of your report which is at page 10?</p> <p>13 A. Sure.</p> <p>14 Q. Actually -- well, let's go ahead and</p> <p>15 finish this, and then we will take a break.</p> <p>16 What did you include in the reference</p> <p>17 section on page 10?</p> <p>18 A. I included references that support</p> <p>19 any -- the statements at the appropriate places</p> <p>20 in my report. I provide references to citations</p> <p>21 where -- that provide evidence to support the</p> <p>22 point I was making.</p> <p>23 Q. Okay. Are there any articles or other</p> <p>24 information that you relied on or cited in your</p>
<p style="text-align: right;">Page 51</p> <p>1 A. No.</p> <p>2 Q. Well, your opinion says that you</p> <p>3 selected the occupation based on experience of</p> <p>4 the plaintiff.</p> <p>5 What did you mean by that?</p> <p>6 A. Again, the counsel provided me with a</p> <p>7 list of occupations that I -- that they</p> <p>8 thought -- for whatever reason they provided a</p> <p>9 list of occupations to me. I don't know if I</p> <p>10 have that list. I may have it. I don't think I</p> <p>11 have it because then I just went to the -- I took</p> <p>12 those occupations and I went to the Bureau of</p> <p>13 Labor Statistics or the Census Department codes,</p> <p>14 and I said what are -- you know, in my opinion, I</p> <p>15 chose occupations that were relevant in</p> <p>16 construction building trades, and I selected</p> <p>17 those occupations that I thought relevant, and</p> <p>18 those are in Appendix A.</p> <p>19 MR. SCHUTTE: We will put this in writing,</p> <p>20 Howard, but we will want to request a copy of</p> <p>21 whatever was provided to the expert. We will put</p> <p>22 it in writing.</p> <p>23 BY MR. SCHUTTE:</p> <p>24 Q. So do I understand correctly your</p>	<p style="text-align: right;">Page 53</p> <p>1 report that you did not cite in the references</p> <p>2 section?</p> <p>3 A. Can you rephrase the question?</p> <p>4 Q. I would be happy to, yeah. It was a</p> <p>5 bad question.</p> <p>6 Are there any references that you</p> <p>7 relied on in your report that you did not include</p> <p>8 in the reference section at page 10?</p> <p>9 A. For example, I referred to some</p> <p>10 websites that are not listed --</p> <p>11 Q. Right?</p> <p>12 A. -- but other than that, as far as I am</p> <p>13 concerned, the citations reflect the reports, the</p> <p>14 literature that I reviewed that I used to support</p> <p>15 the statements in my report.</p> <p>16 Q. Okay. Is there a reason why --</p> <p>17 there's a -- on page -- in page 2 of your report,</p> <p>18 there's a reference to an article or a finding by</p> <p>19 Northrup?</p> <p>20 A. Yes.</p> <p>21 Q. And it's footnoted down to as reported</p> <p>22 in I guess Thieblot or however you say that name.</p> <p>23 A. Yeah.</p> <p>24 Q. Am I missing it or is that article</p>



<p style="text-align: right;">Page 54</p> <p>1 listed in the references?</p> <p>2 A. The Northrup article?</p> <p>3 Q. Yes.</p> <p>4 A. No, I think the -- is the Thieblot</p> <p>5 article listed?</p> <p>6 Q. It's not, and that's why I was</p> <p>7 wondering whether --</p> <p>8 A. That's an oversight.</p> <p>9 Q. Okay. You intended to put into the</p> <p>10 reference section anything -- any articles that</p> <p>11 you relied on in forming your opinion?</p> <p>12 A. I intended to put into the reference</p> <p>13 section any article that I use as evidence to</p> <p>14 support my statements in the report.</p> <p>15 Q. Okay. This might just be</p> <p>16 happenstance.</p> <p>17 Is it possible that there's a page</p> <p>18 missing in that the list here which is</p> <p>19 alphabetical ends at L or is it just a</p> <p>20 coincidence that there aren't any articles that</p> <p>21 you relied that anybody had last names after L?</p> <p>22 A. My quick review suggests that the only</p> <p>23 omitted one was the Thieblot.</p> <p>24 MR. SCHUTTE: Okay. Could we take a five to</p>	<p style="text-align: right;">Page 56</p> <p>1 of those damages, correct?</p> <p>2 A. Correct.</p> <p>3 Q. You are not offering any opinion about</p> <p>4 whether a union-only rule exists in the Chicago</p> <p>5 Loop, correct?</p> <p>6 A. Correct.</p> <p>7 Q. Okay. Now, let's get into the meat of</p> <p>8 your opinion.</p> <p>9 So, as I read it and tell me if this</p> <p>10 is a fair overall description of your approach,</p> <p>11 you have looked at the question of the difference</p> <p>12 between union and non-union wages from three</p> <p>13 angles. You have done a review of academic</p> <p>14 literature. You have done an original analysis</p> <p>15 based on the Current Population Survey data, and</p> <p>16 then you have done an analysis done based on</p> <p>17 Illinois Department of Labor data, and then you</p> <p>18 have ultimately formulated an approach that could</p> <p>19 used you say on a class-wide basis to identify</p> <p>20 the damages that have been suffered.</p> <p>21 Is that a fair overall summary?</p> <p>22 A. Yes.</p> <p>23 Q. On page 1 of the report at the very</p> <p>24 last sentence on page 1 that begins in that</p>
<p style="text-align: right;">Page 55</p> <p>1 ten minute break.</p> <p>2 THE VIDEOGRAPHER: Going off the video</p> <p>3 record at 10:29 a.m.</p> <p>4 (WHEREUPON, a recess was had at</p> <p>5 10:29 a.m. until 10:44 a.m.)</p> <p>6 THE VIDEOGRAPHER: We are back on the video</p> <p>7 record at 10:44 a.m. You may proceed.</p> <p>8 BY MR. SCHUTTE:</p> <p>9 Q. Dr. Kaestner, we talked about at the</p> <p>10 very start of the deposition that what you are</p> <p>11 offering an opinion about is the difference</p> <p>12 between union and non-union wages in the</p> <p>13 occupations that you have defined as relevant to</p> <p>14 the litigation, correct?</p> <p>15 A. Correct.</p> <p>16 Q. I want to make sure so it's clear for</p> <p>17 the record and for the judge some things you are</p> <p>18 not offering an opinion on.</p> <p>19 One of them is you are not offering an</p> <p>20 opinion, are you, as to whether Jones Lang</p> <p>21 LaSalle is liable to WDES, correct?</p> <p>22 A. Correct.</p> <p>23 Q. And you are not offering an opinion</p> <p>24 about whether WDES suffered damages or the amount</p>	<p style="text-align: right;">Page 57</p> <p>1 analysis, you say: "I estimate the difference in</p> <p>2 wages (and fringe benefits) between union and</p> <p>3 non-union workers."</p> <p>4 The only part of the analysis where</p> <p>5 you look specifically at fringe benefits is in</p> <p>6 the section on the Department of Labor -- based</p> <p>7 on the Department of Labor statistics, correct?</p> <p>8 A. Yes, correct.</p> <p>9 Q. You don't look at fringe benefits in</p> <p>10 the Current Population Survey analysis, correct?</p> <p>11 A. That's correct.</p> <p>12 Q. Okay. And then you go on to write:</p> <p>13 "In occupations typically used to move into and</p> <p>14 renovate commercial space."</p> <p>15 How -- can you tell us how you</p> <p>16 identified the occupations that are typically</p> <p>17 used to move into and renovate commercial space?</p> <p>18 A. As I said, I started from a list of</p> <p>19 occupations and then went to the Bureau of Labor</p> <p>20 Statistics or the Census Bureau, they overlap,</p> <p>21 where they have occupational titles and groups</p> <p>22 and tasks by areas. So for construction,</p> <p>23 building trades, and then I chose the occupations</p> <p>24 that I thought would be used in those activities.</p>

<p style="text-align: right;">Page 58</p> <p>1 Q. Okay. Did you consult any materials 2 or rely on anything other than your -- the 3 document you received from plaintiff's counsel 4 and your own work at looking at the available 5 categories in order to identify the occupations 6 typically used to move into and renovate 7 commercial space in downtown Chicago? 8 A. No. 9 Q. Thank you. 10 Finally, at the end of that same 11 sentence, you say -- let me read the whole 12 sentence so it's not out of context: "In that 13 analysis, I estimate the difference in wages and 14 (fringe benefits) between union and non-union 15 workers in occupations typically used to move 16 into and renovate commercial space in downtown 17 Chicago." 18 When you wrote downtown Chicago, what 19 do you mean? 20 A. I meant that the estimate that I -- 21 the estimates that I have obtained and report in 22 the expert testimony and the expert report in my 23 opinion they apply to the -- they would be 24 reasonable and applicable to the downtown Chicago</p>	<p style="text-align: right;">Page 60</p> <p>1 study, you say that between 1970 and 1979, unions 2 raised wages by 14 percent among all workers. 3 I could give you other examples, but 4 what do you mean by unions raised wages? 5 A. I mean that union wages are above the 6 non-union wage. 7 Q. So you don't mean actually that the 8 unions caused the wages to go up. 9 What you are referring to -- it's 10 another way of referring to the difference 11 between union and non-union wages? 12 MR. FOSTER: Object to the form of the 13 question. Misstates his testimony. 14 BY THE WITNESS: 15 A. Do you want to ask another question or 16 should I answer? 17 MR. FOSTER: You can answer the question. 18 BY THE WITNESS: 19 A. So it's -- economic theory widely 20 viewed among economists accepted opinion that 21 unions through restraint of supply of labor raise 22 wages above the market wage, the non-union wage. 23 So that's why that statement raise wages is 24 consistent and is used because that's the</p>
<p style="text-align: right;">Page 59</p> <p>1 Loop as we have defined earlier. 2 Q. So when you wrote downtown Chicago, 3 you mean the same thing as the definition of 4 Chicago Loop that plaintiff uses in their 5 complaint at page 9? 6 A. Yes. That's how I intended it to be 7 used. I was somewhat imprecise in my language. 8 Q. Okay. But just to be clear for the 9 record, there is no part of your analysis where 10 you look at data specific to the Chicago Loop, 11 correct? 12 A. That's correct. 13 Q. Okay. Let's talk about the review of 14 the academic literature. 15 First of all -- which is on pages 2 16 and 3 of your report Exhibit No. 17. It's 17 accurate, is it not, that none of the studies 18 that you looked at that had been done previously 19 are specific to the Chicago Loop? 20 A. That's correct. 21 Q. Okay. Now, you used throughout these 22 two pages on a number of occasions, you used the 23 phraseology unions raised wages. For example, in 24 your description in the bullet about the Lewis</p>	<p style="text-align: right;">Page 61</p> <p>1 mechanism that creates the union, non-union 2 differential in wages. 3 BY MR. SCHUTTE: 4 Q. Okay. In the section little two, 5 which is Studies Related to Construction -- well, 6 let me strike that and start over. 7 Section little i on page 2 Studies 8 Related to All Workers, those are studies that 9 deal with all union versus non-union workers, not 10 specific to the construction industry, correct? 11 A. That's correct. 12 Q. And in section little ii Studies 13 Related to Construction Workers, those are 14 studies related to the construction industry, 15 correct? 16 A. Correct. 17 Q. Do any of those construction -- the 18 studies related to construction workers use the 19 same occupations that you chose to use in your 20 analysis -- your original analysis of the Chicago 21 metropolitan area or the Cook County data? 22 A. Yes, there would be significant 23 overlap. I don't know exactly how much overlap, 24 but there's significant overlap because the</p>

<p style="text-align: right;">Page 62</p> <p>1 occupations in Appendix A are under the broader 2 heading construction. 3 Q. Okay. 4 A. So there would be, as I say, a great 5 deal of overlap. I can't say exactly the overlap 6 between these -- the occupations in these studies 7 and -- these studies mostly use the same data 8 source and the same general approach. 9 Q. They use the same current population 10 survey data? 11 A. Yes. 12 Q. Okay. Did you actually look at these 13 studies to determine whether they overlapped 14 exactly or substantially with the occupations 15 that you included in your original analysis? 16 A. I did review all these studies. These 17 studies don't list exactly all the occupations. 18 They included -- to the best of my knowledge, 19 they would include all occupations under the 20 broader category of construction as listed in the 21 occupational classification on Appendix A which 22 is not exactly that, but these are the 23 occupations -- these are the majority of 24 occupations listed under the broader group -- the</p>	<p style="text-align: right;">Page 64</p> <p>1 Bilginsoy, if I am pronouncing that correctly, 2 only one of the studies, the Bilginsoy study uses 3 data more recent than 2002; isn't that correct? 4 A. That's correct, but I would add that 5 the -- one of the main findings of this review of 6 the literature was that the estimates of the 7 difference between union and non-union wages was 8 remarkably stable through a very long period of 9 time as indicated by these various studies. 10 Q. But, again, to answer my question, 11 only the Bilginsoy study uses data more recent 12 than 2002? 13 MR. FOSTER: Objection, asked and answered. 14 You can answer. 15 BY THE WITNESS: 16 A. That's correct. 17 BY MR. SCHUTTE: 18 Q. You testified to this generally, but 19 when you looked at these studies related to 20 construction workers, did you confirm that they 21 rely on the Current Population Survey, or did you 22 look at whether any of them relied on different 23 data sets? 24 A. The older studies relied on different</p>
<p style="text-align: right;">Page 63</p> <p>1 vast majority of occupations that were used in 2 these studies. So I would -- it's my opinion 3 that these studies are very relevant to the exact 4 question that I am answering. 5 Q. Okay. None of the studies in -- the 6 studies related to construction workers are 7 specific to the Chicago Loop, correct? 8 A. That's correct. 9 Q. And none are specific to the Chicago 10 metropolitan area, correct? 11 A. That is correct. 12 Q. And -- 13 A. Can I -- 14 Q. Of course, yes. 15 A. I would like to note that all of these 16 studies have -- there's a very consistent finding 17 across all of these studies by time, by year. So 18 that's an important fact to recognize. 19 Q. None of the studies in the section 20 called Studies Related to Construction Workers 21 have -- rely on data that's more current than 22 2007, correct? 23 A. That's correct. 24 Q. And only one of the studies that's the</p>	<p style="text-align: right;">Page 65</p> <p>1 data sets. The more recent studies -- and 2 everybody but Northrop relied on the Current 3 Population Surveys to the best of my 4 recollection. 5 Q. Okay. How did you chose the studies 6 related to construction workers that you included 7 in your report? 8 A. I did a review of the academic 9 literature, and these were all the studies that I 10 uncovered. I don't leave any out. 11 Q. Thank you. That was what I was going 12 to ask. 13 Now, you testified a moment ago, and I 14 will paraphrase what you said, that you -- your 15 reading of the studies related to construction 16 workers is that they -- your analysis of them 17 concluded that the difference between union and 18 non-union wages was I think you said remarkably 19 stable over time. 20 Is that your testimony? 21 MR. FOSTER: Well, objection. Could you 22 just refer him to where you are quoting? 23 MR. SCHUTTE: I am quoting from what he 24 said --</p>

<p style="text-align: right;">Page 66</p> <p>1 MR. FOSTER: Okay. Wait, you mean -- okay.  2 You mean in a prior answer here?  3 MR. SCHUTTE: Yes.  4 MR. FOSTER: Okay. Okay. Go ahead, sorry.  5 BY THE WITNESS:  6 A. Let me be more precise. You can see  7 that the estimates in Section A little ii are --  8 range from the smallest estimate -- it's here but  9 we can review was I think 24, and the largest was  10 54, but there's a preponderance of estimates in  11 the -- around 40 -- 40 to 45 percent. So that's  12 what I meant by remarkably stable because it  13 spans a period of time stretching from 1936  14 through basically 2007.  15 BY MR. SCHUTTE:  16 Q. The gap between union and non-union  17 wages though changed over time?  18 A. Not -- not from my reading of the  19 evidence. That there was different estimates,  20 for example, 50 percent in 1936 or 43 percent as  21 reported in Northrup, and then the 41 percent  22 reported in Blanchflower Bryson in the 1996 to  23 2000 range. So over time those two estimates are  24 43 percent and 41 percent and span a period of 70</p>	<p style="text-align: right;">Page 68</p> <p>1 come up with a different number 47 percent in  2 '83, '88, 38 percent in 2002, 2007. Then they  3 speculate on what reason that might be, but in  4 terms of what they actually report and the  5 evidence, that's the evidence.  6 MR. SCHUTTE: Let's mark this Exhibit 21  7 please -- 20, please.  8 (WHEREUPON, a certain document  9 was marked Exhibit No. 20, for  10 identification, as of 2/21/20.)  11 BY MR. SCHUTTE:  12 Q. Exhibit 20, Dr. Kaestner, is the  13 article titled Union Wage Gap in the U.S.  14 Construction Sector: 1983 to 2007 by Cihan,  15 C-I-H-A-N, Bilginsoy, B-I-L-G-I-N-S-O-Y, from the  16 journal called Industrial Relations dated July of  17 2013.  18 This is the article that you refer to  19 in your report at page 3, correct?  20 A. Correct.  21 Q. Okay. And the very first thing that  22 Mr. Bilginsoy -- assume that -- do you know  23 Mr. Bilginsoy?  24 A. I do not know him.</p>
<p style="text-align: right;">Page 67</p> <p>1 years.  2 So that is why, and then I would also  3 comment that in studies related to all workers,  4 you see again the remarkable stability of the  5 estimate across studies and over time.  6 Q. Okay. Would you agree with me based  7 on your experience in labor economics, that the  8 power of unions ebbs and flows over time?  9 A. I don't know what you mean by the  10 power of the unions.  11 Q. Did you read the Bilginsoy article?  12 A. Yes, I have read every article that I  13 have got here.  14 Q. Isn't it correct that the entire point  15 of the Bilginsoy article was to try to understand  16 the reason for the declining union power and the  17 quote shrinking union wage premium in the U.S.  18 construction industry between the 1980s and  19 2000s?  20 A. The point of the Bilginsoy article --  21 I don't know what the intention of the author  22 was, but the results reported were that they look  23 at the union, non-union wage differential in  24 construction trades between 1983 and 2002. They</p>	<p style="text-align: right;">Page 69</p> <p>1 Q. Do you know if it's a man or a woman?  2 A. I do not.  3 Q. I assume it's a man, but I could be  4 accused of being sexist if I am shown to be  5 wrong.  6 Mr. Bilginsoy writes at the start --  7 sort of the synopsis of his article: "Wage gap  8 decomposition shows that declining union power  9 was the principal force behind the shrinking  10 union wage premium in the U.S. construction  11 industry between the 1980s and the 2000s."  12 Did I read that correctly?  13 A. Yes, I didn't -- I wasn't --  14 Q. Do you agree with Mr. Bilginsoy that  15 there was a shrinking union wage premium in the  16 U.S. construction industry between the 1980s and  17 the 2000s?  18 A. I agree that they -- in their  19 estimates they produced two estimates, one for  20 the 1983 to '88 period and one for the 2000 and  21 2007 period, and that those are different. They  22 do not -- I don't think they actually provide  23 whether they are in a statistical sense  24 different.</p>

<p style="text-align: right;">Page 70</p> <p>1 Q. Let's take a look at that. There's a  2 Table 1 in the Bilginsoy article at page 685.  3 It's titled Unionization Rates and Real Wages in  4 Construction Trades.  5 Do you see that?  6 A. Yes, I do.  7 Q. So in a 1983 to '88 sample, the union  8 premium for all trades is 86.8 percent and the  9 union premium in the 2002 to 2007 sample is 78.2  10 percent, correct?  11 A. That's what this reported, yes.  12 Q. Yes. And the union premium for basic  13 trades in the '83 to '88 sample is 88.3 percent,  14 and then in the 2000 to -- excuse me -- the 2002  15 to 2007 sample, the union premium for basic  16 trades is 81.3 percent, correct?  17 A. That's what's reported in the table as  18 the means of wages for people in their sample.  19 Q. And for mechanical trades, the '83 to  20 '88 sample has the union premium 80.6 percent,  21 and in the 2002 to 2007 sample, it is at 61.3  22 percent for the mechanical trades, correct,  23 that's what they report?  24 A. That's what they report.</p>	<p style="text-align: right;">Page 72</p> <p>1 Q. Which table of Bilginsoy are you  2 using?  3 A. Well, I have written 47 and 38. So  4 those are the numbers that I am relying on now.  5 Q. Perhaps you could point us to where  6 those came from.  7 A. Yeah. And the reason I am -- say  8 there's several different analyses, different  9 levels of -- that are used in the analysis. So I  10 want to find -- there's preferred analyses and  11 non-preferred analyses by the authors'  12 description.  13 Here we go Table 5.  14 Q. Okay. What page is that on?  15 A. Page 691. Sorry for taking so long.  16 Q. First, can you just point to us where  17 you got the 47 percent and the 38 percent that's  18 referenced in page 3 of your report?  19 A. Yes, that's -- it's under the row.  20 It's called Union Effect Adjusted Wage Gap .467.  21 That's in log points in logarithm. So that's not  22 exactly, but 47 percent is -- would be the  23 interpretation, and then there would be 38  24 percent -- .378 would be 38 percent for the 2000,</p>
<p style="text-align: right;">Page 71</p> <p>1 Q. And would you agree that if those  2 numbers are accurate, that there is a shrinking  3 union wage premium in the U.S. construction  4 industry between the 1980s and 2000s as  5 Mr. Bilginsoy writes on page 1 of his article?  6 A. I would not agree with that statement  7 as consistent with the evidence that's presented  8 because -- I wouldn't agree with that as being  9 consistent with the evidence in Table 1 or other  10 places in the document.  11 Q. But you rely on Mr. Bilginsoy, do you  12 not, in your report as being a good data point  13 for the union wage difference in the construction  14 industry -- I guess that's the end of my  15 question. Let me rephrase the question.  16 You rely on Bilginsoy as one of seven  17 studies related to construction workers that you  18 later in the report say verifies or validates the  19 conclusions you reach in your original analysis?  20 A. That's correct, except my evidence  21 that I am using is not the same as Table 1. I am  22 using evidence in other tables that are more --  23 that are different than Table 1, and those are  24 the evidence that I refer to.</p>	<p style="text-align: right;">Page 73</p> <p>1 2007.  2 There's very similar evidence reported  3 in a different type of analysis called the IV,  4 Instrumental Variables corrected, and it's almost  5 identical .47 and .38. So those are the numbers  6 I use. Those are the numbers that are preferred  7 and stated by the authors or the author in this  8 case as those that are preferred and what they  9 believe is most correct.  10 Q. Where does the author say that?  11 A. In the description of the analysis.  12 That's why they did this -- these two different  13 approaches, but they are remarkably consistent.  14 Q. But the fact that the union effect  15 adjusted wage gap of 47 percent in 1983 to 1988  16 had shrunk to 30 -- you used 38 percent which is  17 rounding up in 2002 to 2007. That does  18 demonstrate what Bilginsoy says at the very start  19 of his article that there is a shrinking union  20 wage premium in the U.S. construction industry,  21 correct?  22 It's gone from 47 in '83 to '88 down  23 to 38 percent in 2002, 2007?  24 A. Yes, except that if you look at the</p>



<p style="text-align: right;">Page 74</p> <p>1 Blanchflower Bryson article which uses the exact 2 same period '83 to '88, they report the union 3 wage premium of 52 percent. So these estimates 4 are just one of many that's why I put as the 5 academic literature. None should be preferred -- 6 preferred or advantaged over other ones. Again, 7 the point of my review is to show the stability 8 and similarity of the academic literature, and 9 then I provided my own analysis with current data 10 along the same lines as them to answer the 11 question. 12 Q. So your testimony is that Bilginsoy's 13 data is just one of many approaches that could be 14 taken, none is more right than any other; is that 15 correct? 16 A. My report reviews academic studies and 17 reports on what the several academic studies have 18 reported in analyses of the union wage premium in 19 construction. Every analysis has slight 20 differences. For example, in Bilginsoy they talk 21 about -- or is this the one with mechanical 22 trades. It's not clear what mechanical trades 23 are, all trades, basic trades. 24 So every report might be somewhat</p>	<p style="text-align: right;">Page 76</p> <p>1 up with the seven studies that are discussed in 2 the academic literature section of my report. 3 Isn't that what you do? 4 A. I think that I compare my estimate to 5 the academic literature to establish that my 6 estimates aren't particularly unusual. 7 Q. Okay. Do you agree with Bilginsoy his 8 analysis that the difference between union and 9 non-union wages for construction workers was 47 10 percent in 1983 to 1988? 11 A. That's the estimate he reported. I 12 don't have to agree or disagree with it. This is 13 the estimate that they reported based on their 14 analysis. I accept that estimate. 15 Q. Okay. And you also accept the 16 estimate of 38 percent in 2002 to 2007, correct? 17 A. When I say accept the estimates, those 18 are the estimates I reported. They have drawn 19 their own conclusions. I didn't draw conclusions 20 from those estimates. I just reported the 21 estimates. 22 Q. Based on all of the articles you 23 looked at, will you agree with me that the union 24 wage gap between union workers in the</p>
<p style="text-align: right;">Page 75</p> <p>1 different for that reason, but a preponderance of 2 evidence and assessment of the evidence that's 3 why these studies were there to provide 4 background for my own analysis and some 5 comparison to my own analysis. 6 Q. So is it fair to say that you rely on 7 Bilginsoy's numbers, the 47 percent in 1983 to 8 '88 and 38 percent in 2002 to 2007, but you 9 disagree with his statement that there is a 10 shrinking union wage premium in the U.S. 11 construction industry between the '80s and the 12 2000s? 13 A. Can you clarify what you mean by rely 14 on? 15 Q. You cited seven studies in -- related 16 to construction workers in your review of 17 academic literature, correct? 18 A. Correct. 19 Q. And later you come to the conclusion 20 that your original analysis based on the current 21 population survey and Illinois Department of 22 Labor data -- I will paraphrase here and we will 23 talk about it later, but you say one reason why I 24 think my numbers are right is because they line</p>	<p style="text-align: right;">Page 77</p> <p>1 construction industries and non-union workers in 2 the construction industry changes over time? 3 A. Again, based on my reading of the 4 evidence and my conclusion is that the union 5 premium in construction has generally been 6 relatively stable, and that it's not -- there's 7 no consistent evidence of a mark change 8 substantially over time. 9 MR. SCHUTTE: Let's mark this as 21, please. 10 This is the Blanchflower and Bryson article that 11 you cite. 12 (WHEREUPON, a certain document 13 was marked Deposition Exhibit No. 14 21, for identification, as of 15 2/21/20.) 16 BY MR. SCHUTTE: 17 Q. I'll start over with apologies to 18 Andrea. 19 What we have marked as Exhibit 21 is 20 the Blanchflower Bryson article titled What 21 Effect Do Unions Have on Wages Now and Would 22 Freeman and Medoff Be Surprised from the Journal 23 of Labor Research summer of 2004. 24 Are you familiar with the Journal of</p>

<p style="text-align: right;">Page 78</p> <p>1 Labor Research, Dr. Kaestner?</p> <p>2 A. I am, yes.</p> <p>3 Q. Is that a widely accepted journal in</p> <p>4 the field of labor economics?</p> <p>5 A. I think it's a journal that's in -- a</p> <p>6 labor economics journal, a professional journal</p> <p>7 of labor economics. That's my opinion.</p> <p>8 Q. Is that a prestigious journal?</p> <p>9 A. It's a professional journal with peer</p> <p>10 review. Whether what journals are prestigious or</p> <p>11 not are in the eye of the beholder.</p> <p>12 Q. Is it widely considered to be</p> <p>13 prestigious like you say the Chicago -- you say</p> <p>14 the National Bureau of Economic Research is</p> <p>15 widely considered to be prestigious.</p> <p>16 Would you consider the Journal of</p> <p>17 Labor Research to be widely considered to be</p> <p>18 prestigious?</p> <p>19 A. Again, I am going to tell you that</p> <p>20 this is a professional peer-reviewed journal that</p> <p>21 publishes articles in the Journal of Labor</p> <p>22 Economics. I would assess the credibility of</p> <p>23 every article that is presented and to draw my</p> <p>24 conclusions of it. In terms of do I believe that</p>	<p style="text-align: right;">Page 80</p> <p>1 characterize it.</p> <p>2 Q. Have you read the book?</p> <p>3 A. I have.</p> <p>4 Q. Okay. But why did you qualify your</p> <p>5 statement unions at the time?</p> <p>6 A. Because it was written in 1984. So I</p> <p>7 think it was a very important work and</p> <p>8 comprehensive analysis that had not been</p> <p>9 previously done.</p> <p>10 Q. Okay. Where in the Blanchflower and</p> <p>11 Bryson article did you get the numbers that you</p> <p>12 cite on page 3 of your report?</p> <p>13 A. Well, Table 8 is one of the numbers.</p> <p>14 You can see that the -- in construction -- the</p> <p>15 line labeled Construction says the change in</p> <p>16 premiums is minus 10.7 rounding to 11, and that's</p> <p>17 consistent with the 52 and 41 that I cite in the</p> <p>18 report. I am having trouble identifying the 52</p> <p>19 and 41 exactly where that comes from in the</p> <p>20 report, but that's consistent with what I wrote,</p> <p>21 and I am sure the 52 and 41 are in there. I just</p> <p>22 can't put my finger on it right now.</p> <p>23 I think it's on page 3 -- on page 397.</p> <p>24 We used our data to estimate separate results by</p>
<p style="text-align: right;">Page 79</p> <p>1 there's -- that this reflects a professional</p> <p>2 peer-reviewed journal that imbues it with the</p> <p>3 qualities that that comes with, yes.</p> <p>4 Q. Okay. Did you read the Blanchflower</p> <p>5 and Bryson article in connection with your work</p> <p>6 on this?</p> <p>7 A. I did.</p> <p>8 Q. Okay. Did you read all the articles</p> <p>9 that you cited in your report?</p> <p>10 A. I read -- the only article that I</p> <p>11 didn't read is because of where I say reported in</p> <p>12 another article because those were results of</p> <p>13 analysis reported in those articles.</p> <p>14 Q. Okay. At the very start of their</p> <p>15 article Blanchflower and Bryson write that the</p> <p>16 book published in January 1985 -- excuse me --</p> <p>17 the book from 1984 called What Do Unions Do is</p> <p>18 according to Blanchflower and Bryson the most</p> <p>19 famous book in labor economics and industrial</p> <p>20 relations.</p> <p>21 Do you agree with that?</p> <p>22 A. I agree it was one of the most</p> <p>23 comprehensive analyses of what -- of unions at</p> <p>24 the time, and that's what I -- how I would</p>	<p style="text-align: right;">Page 81</p> <p>1 two digit industry. We chose these years using</p> <p>2 these data. We also found considerable</p> <p>3 variation. There is less variation in the wage</p> <p>4 gap by industry in the later period --</p> <p>5 Q. Sorry. You have to slow down.</p> <p>6 A. I'm sorry. Anyway it's on page 397,</p> <p>7 and it's at the bottom of page 397, and you see</p> <p>8 41 percent and 52 percent in construction as</p> <p>9 reported by the authors, and then those two</p> <p>10 numbers again feed into Table 8 where they report</p> <p>11 a minus 10.7 percent.</p> <p>12 Q. Okay. So to sum up what I have been</p> <p>13 asking you about, Blanchflower and Bryson find</p> <p>14 that the union wage premium in 1983 to 1988</p> <p>15 period is 52 percent, and Bilginsoy finds that</p> <p>16 during that same period it's 47 percent, correct?</p> <p>17 A. That's as reported, yes.</p> <p>18 Q. And then Blanchflower and Bryson find</p> <p>19 that by the 1996 to 2001 time period, the union</p> <p>20 premium has dropped to 41 percent, correct?</p> <p>21 A. That's correct.</p> <p>22 Q. And Bilginsoy looks at a different</p> <p>23 time period 2002 to 2007, but he sees that the</p> <p>24 wage gap has dropped to 38 percent, correct?</p>



<p style="text-align: right;">Page 82</p> <p>1 A. Yes.</p> <p>2 Q. So isn't it fair to say that both</p> <p>3 Blanchflower and Bryson and Bilginsoy find a</p> <p>4 shrinking union wage premium in the U.S.</p> <p>5 construction industry between the 1980s and the</p> <p>6 2000s?</p> <p>7 A. Throughout the United States. So I</p> <p>8 would just qualify your -- that in the United</p> <p>9 States as a whole these estimates suggest that</p> <p>10 there's been -- not suggest. They just report as</p> <p>11 a mean estimate with confidence intervals around</p> <p>12 them a lower estimate in the later period than in</p> <p>13 the early period. They do not report whether</p> <p>14 they are statistically different from each other.</p> <p>15 Q. Do you have an issue with them using</p> <p>16 data from across the United States in their</p> <p>17 analysis?</p> <p>18 A. What do you mean an issue?</p> <p>19 Q. Do you think it was appropriate for</p> <p>20 them to use data from construction industry</p> <p>21 wages -- strike that.</p> <p>22 Do you think it was appropriate for</p> <p>23 them to use data about construction industry</p> <p>24 wages from throughout the United States to do</p>	<p style="text-align: right;">Page 84</p> <p>1 you are reviewing previously written academic</p> <p>2 studies?</p> <p>3 A. That's correct.</p> <p>4 Q. Okay. Thank you.</p> <p>5 Okay. So your analysis based on the</p> <p>6 current population survey starts on page 3 of</p> <p>7 your report, correct?</p> <p>8 A. Yes.</p> <p>9 Q. Why did you choose the current</p> <p>10 population survey data?</p> <p>11 A. This is the most widely used data to</p> <p>12 estimate the union, non-union wage differential.</p> <p>13 It's one of the few data sets that report whether</p> <p>14 a worker is covered by a union or not, and it has</p> <p>15 the largest sample size that are available to</p> <p>16 conduct the analysis, and as I say, it's been</p> <p>17 widely used in many analysis, not just of the</p> <p>18 union, non-union wage differential but of</p> <p>19 analysis of wage differentials in general.</p> <p>20 Q. Did you consider other data --</p> <p>21 consider but reject using other data sets? And</p> <p>22 I'll set to the side the Department of Labor</p> <p>23 statistic that you use later in your report.</p> <p>24 A. Just let me just correct you. That's</p>
<p style="text-align: right;">Page 83</p> <p>1 their analysis that's summarized in their</p> <p>2 articles?</p> <p>3 A. Their intent was to describe the</p> <p>4 situation in the United States. So that is</p> <p>5 appropriate.</p> <p>6 Q. I want to change gears now and start</p> <p>7 asking you about your analysis of the</p> <p>8 government -- the data.</p> <p>9 At page 1 of your report you refer to</p> <p>10 this as an original analysis of official</p> <p>11 government data. What did you mean by that?</p> <p>12 A. That I conducted these -- the</p> <p>13 statistical analysis using data made -- collected</p> <p>14 and made available by the federal government.</p> <p>15 Q. But why did you say it was original?</p> <p>16 A. Because I did it.</p> <p>17 Q. Did you mean to state that it is</p> <p>18 original because no one to your knowledge had</p> <p>19 ever done an analysis before of the union versus</p> <p>20 non-union wage gap in the Chicago metropolitan</p> <p>21 area?</p> <p>22 A. No, I used the word original to --</p> <p>23 perhaps incorrectly to refer to that I did this.</p> <p>24 Q. Okay. As opposed to the section where</p>	<p style="text-align: right;">Page 85</p> <p>1 the Illinois Department of Labor prevailing wage.</p> <p>2 I searched for other available data</p> <p>3 sets, and I didn't find any that were acceptable</p> <p>4 or that I felt were better than the Current</p> <p>5 Population Survey.</p> <p>6 Q. Dr. Kaestner, prior to your work on</p> <p>7 this matter, had you ever done any work with the</p> <p>8 Current Population Survey data?</p> <p>9 A. Yes.</p> <p>10 Q. The Current Population Survey is</p> <p>11 self-reporting, correct?</p> <p>12 A. Yes, it's information that's reported</p> <p>13 by individuals to surveyors. Let me add it's</p> <p>14 generally considered very high quality in</p> <p>15 reporting of the data.</p> <p>16 Q. So over on page 4 -- maybe I can try</p> <p>17 to summarize to see if I understand what it is</p> <p>18 you did is that you took all of the occupations</p> <p>19 that are listed in Appendix A which is a list we</p> <p>20 have talked about that you came up with based on</p> <p>21 what was provided to by plaintiff's counsel and</p> <p>22 your own review of the data.</p> <p>23 You -- for purposes of page 4, you</p> <p>24 melded all of that into a single data set, and</p>

<p style="text-align: right;">Page 86</p> <p>1 you looked at the union wage premium inside the  2 Chicago, Naperville, Joliet metropolitan area and  3 outside that area, and the summary as reflected  4 in the bullets on page 4; is that correct?  5 A. Yes.  6 Q. And what you concluded was that the  7 union wage premium in the combined occupations  8 listed in Appendix A is 39 percent in areas  9 outside the Chicago metropolitan area and 47  10 percent inside the Chicago metropolitan area,  11 correct?  12 A. That's correct.  13 Q. Do you have an understanding that you  14 could explain to the judge and jury of what is  15 encompassed by what you referred to as the  16 Chicago-Naperville-Joliet metropolitan area?  17 A. Well, it's an official designation of  18 the U.S. Census, an official government  19 designation. I don't know exactly the  20 geographical boundaries, but it includes  21 Naperville and Joliet --  22 Q. Do you know if it includes --  23 A. -- and Chicago and the Loop.  24 Q. Right. And here is what I am getting</p>	<p style="text-align: right;">Page 88</p> <p>1 Q. In what form is it kept?  2 A. It's in an electronic data set and in  3 a -- in a software, statistical software program  4 format.  5 Q. Okay. How did you adjust  6 statistically for the fact that you are using  7 data from several years? What do you mean by  8 that?  9 A. Yeah, so I allow the effect of the  10 wages to differ by year to account for variation  11 in inflation and changes in wages over time.  12 Q. Is that calculation reflected in the  13 electronic data set that you referred to that's  14 kept in the statistical software program?  15 A. That calculation -- first of all, let  16 me say this is a standard approach that you can  17 find in thousands of analyses -- similar  18 analyses. Second, that calculation is reflected  19 in the figures in Section I here, the 39 percent  20 and the 47 percent.  21 Q. What I am asking is is, for example,  22 if we wanted to have an expert replicate what you  23 did, is the data set that you used and the  24 analysis that you did to statistically adjust for</p>
<p style="text-align: right;">Page 87</p> <p>1 at. I am not fighting with you. I just don't  2 understand it myself is does it include, for  3 example, all of Cook County plus DuPage and Lake  4 and whatever county Joliet is it in -- what I am  5 not remembering right now -- Will?  6 A. It includes all of Cook County. As I  7 say, I don't know the exact geographical  8 boundaries. The reason I use this is because  9 it's the smallest geographical area that's  10 available to do the analysis.  11 Q. And where is this information  12 available?  13 A. What information specifically?  14 Q. The information that you used to make  15 your -- to do your analysis that's summarized in  16 the first two bullets on page 4. Is it a  17 publicly available website?  18 A. Yes.  19 Q. Did you retain the data that you  20 pulled in and analyzed for union wage premiums  21 inside and outside the Chicago metropolitan area?  22 A. I did.  23 Q. Is it in a spreadsheet?  24 A. It is not.</p>	<p style="text-align: right;">Page 89</p> <p>1 the fact that you are using data from several  2 years available currently in the software program  3 that you discussed earlier?  4 A. Yes, the analysis could be replicated.  5 Q. Okay. What did you mean when you say:  6 Also calculate estimates using the sample survey  7 weight provided by the CPS or Current Population  8 Survey?  9 A. That means there's a different -- that  10 each person in the survey has a probability of  11 being sampled relative to their population, and  12 so this again is a very standard approach to  13 adjust the estimates for that they might sample a  14 little bit more of one group, a little bit less,  15 and these weights adjust for that. I don't think  16 that they make almost any difference to what I  17 have reported here whether you do or do not make  18 that adjustment.  19 Q. Okay. I am not a statistician so bear  20 with me on this question.  21 When you say sample -- I want to make  22 sure I understand we are on the same page by what  23 you mean by sample. So in the CPS there is a  24 pool of data available about union and non-union</p>

<p style="text-align: right;">Page 90</p> <p>1 workers in the industries in Appendix A. Did you 2 use all of that data to do your analysis or did 3 you take a sample from that data? 4 A. No. So the Current Population Survey 5 is -- we refer to it as a sample because it's a 6 sample of the broader population. 7 Q. Right. 8 A. So that sampling reflects that not 9 everybody is drawn perfectly randomly from the 10 population. They might overrepresent a 11 particular geography or a particular type of 12 person. They calculate weights to account for 13 that. The survey is very standard. It's an 14 excellent survey. So year after year it's a very 15 comparable survey. 16 That's what I mean by sample. Given 17 the sample -- and I think I am pretty explicit in 18 what I say is the analysis is restricted to 19 workers ages 18 to 64 who are employed in the 20 private sector in the years 2011 to 2019, and 21 then among that group, I use everybody that I can 22 observe. 23 Q. Okay. Thank you. That last one the 24 use of sample I wanted to make sure I understood.</p>	<p style="text-align: right;">Page 92</p> <p>1 Q. Okay. Do you know whether any of 2 the -- are you aware that during the class 3 period, the buildings managed by JLL at one point 4 or another there was 20 such buildings? 5 A. I am not aware. 6 Q. Okay. Would your analysis -- we will 7 get to this later, but would your analysis apply 8 it a tenant in one of those 20 buildings managed 9 by JLL who was a public sector tenant? For 10 example, if the Illinois Department of Labor or 11 the Illinois secretary of space (sic) is a tenant 12 in one of the 20 class buildings, would your 13 analysis apply to that tenant? 14 A. My analysis would apply to people who 15 have used private sector workers. 16 Q. Even if it's a public sector -- 17 A. If they use private sector workers, my 18 analysis would -- to do the renovation and move 19 in, then I would say my results apply. 20 Q. Thank you. I'm sorry if I am being 21 obtuse, but just so I can restate it. 22 The analysis is not on who the tenant 23 is or who the person having the work performed 24 for them is. It's whether the workers are</p>
<p style="text-align: right;">Page 91</p> <p>1 Sampling, as you use it in your 2 report, refers to what is done in the current 3 population survey to get their data, but once you 4 had their data, you did not pick a sample or 5 subset of that data to run your analysis? 6 A. No, as a -- so there's a little bit of 7 imprecision. I said the sample for the analysis. 8 So I selected. I didn't take everybody in the 9 Current Population Survey. I restricted to those 10 who are 18 to 64 employed in private sector, not 11 government jobs, state, or federal, local 12 government jobs in these years. 13 Q. But within those parameters, you use 14 all the data available without sampling? 15 A. Yes. 16 Q. Okay. Thank you. That clarifies one 17 issue I had reading this. 18 Why did you confine the work you did 19 to the public sector -- excuse me -- to the 20 private sector? 21 A. Because I -- I was intending to 22 estimate the union, non-union wage differential 23 for employees who are employed in the private 24 sector, not by government.</p>	<p style="text-align: right;">Page 93</p> <p>1 private or public workers? 2 A. The analysis is privately employed 3 workers. 4 Q. Okay. 5 A. I don't want to be difficult. 6 Q. No, you are not being difficult. I 7 appreciate your helping me understand the 8 analysis. 9 Can you explain for the judge and the 10 jury what you mean at the end of bullet 1 where 11 you say: It was highly significant from a 12 statistical perspective (p-value of less than 13 .001)? 14 A. That means that if you -- that with 15 great certainty the estimate of 39 percent is 16 very different from zero, and, in fact, it's very 17 a small confidence interval around it. So the 18 idea that it's a very precise estimate. It 19 doesn't go from minus 10 to minus 80. That 39 20 percent is a very reliable, credible estimate 21 that if you did this analysis with a thousand 22 different samples, you would get 39 percent a lot 23 of times. 24 Q. Okay. And in the second bullet you</p>

<p style="text-align: right;">Page 94</p> <p>1 have a p-value of .06, but that's referring to  2 the difference between 39 percent and 47 percent,  3 correct?  4 A. Correct, but can I clarify?  5 Q. Of course.  6 A. That the 47 percent is still very  7 reliable in and of itself as being very different  8 with great certainty from zero and, in fact, with  9 94 percent certainty, it's different from 39.  10 Q. Did you calculate the p-value of 47  11 percent?  12 A. I did not. I did not report it so,  13 but given that 47 percent is bigger than the 39  14 percent, the p-value will be probably very  15 equivalent to the .0001.  16 Q. Okay. The sentence at the end of the  17 second bullet point: "The higher union wage  18 premium in the Chicago than the U.S. is  19 consistent with the greater union density in  20 Chicago than in the rest of the U.S.; the share  21 of workers in unions in the occupations in  22 Appendix A in Chicago is twice that of the U.S."  23 What is the source of that sentence?  24 A. That's the current population survey</p>	<p style="text-align: right;">Page 96</p> <p>1 A. It's not always reported as an hourly  2 wage. It's sometimes reported as a weekly wage,  3 and so I use both of those, and I think, as I say  4 in the report, I adjust for the fact that  5 sometimes it's reported as an hourly wage and  6 sometimes reported as a weekly wage.  7 Q. But in either instance it is a wage  8 over a particular period of time, either per hour  9 or per week?  10 A. Yes, and it applies to the last  11 year --  12 Q. Okay.  13 A. -- or I'm sorry -- at the time of the  14 interview.  15 Q. And just so that I -- I think I have  16 already asked you this. So, Howard, I will save  17 you the asked and answered, but I want to make  18 sure I am clear.  19 When you use the term metropolitan  20 Chicago throughout your report, you are talking  21 about the Chicago-Naperville-Joliet metropolitan  22 area?  23 A. Correct.  24 Q. Okay. Dr. Kaestner, why did you chose</p>
<p style="text-align: right;">Page 95</p> <p>1 and the -- directly from the sample and the  2 analysis that I -- the same data that I have used  3 to calculate these estimates.  4 Q. What is the relationship between  5 greater union density and a higher union wage  6 premium? Why do you draw that conclusion?  7 A. As I think I have cited the evidence,  8 but in general there's evidence to show that  9 because unions constrain labor supply, they are  10 more effective at doing that when they have a  11 larger share of the workforce. Given that  12 greater -- this is what people refer to as their  13 greater union power, that they have been able  14 to -- so you would expect a higher union non-wage  15 union premium in Chicago versus the rest of the  16 United States because of that higher density,  17 greater ability to restrict entry of labor.  18 Q. Okay. And I should have asked this  19 early on, but I want to make sure that it's clear  20 for the record.  21 When you are talking about the  22 difference between union and non-union workers,  23 you're talking -- the analysis that's being done  24 on a dollar per hour basis, correct?</p>	<p style="text-align: right;">Page 97</p> <p>1 to use the time period 2011 to 2019?  2 A. There was two reasons. One is because  3 any individual year does --  4 Q. Go ahead. I'm sorry.  5 A. Any individual year does not have --  6 would have less sample size, and the size of the  7 number of observations and sample used in the  8 analysis is important to how you measure the  9 precision of the estimate, again, how much  10 certainty --  11 Q. Yes.  12 A. -- you can put behind the estimates.  13 So and then I did not go back before 2011. One,  14 I wanted to keep the data as recent as possible  15 and, two, that the occupational classifications  16 changed between 2010 and 2011.  17 Q. Okay. Are you aware that the class  18 that the plaintiffs are seeking to certify in  19 this case begins in 2014?  20 A. Not explicitly.  21 Q. Would you have been able to do the  22 same analysis you did using data only from 2014  23 to 2019?  24 A. Not the same because it would not have</p>

25 (Pages 94 - 97)

<p style="text-align: right;">Page 98</p> <p>1 the same level of certainty and precision --</p> <p>2 Q. Yes.</p> <p>3 A. -- but let me also state that these</p> <p>4 estimates reflect the average over the entire</p> <p>5 period controlling for the variation in wages and</p> <p>6 are expressed as a percentage.</p> <p>7 Q. Let me ask a more precise question.</p> <p>8 Would there have been enough data</p> <p>9 available for you to do the same analysis that</p> <p>10 you did for the time period 2014 to 2019, and I</p> <p>11 recognize that the results may have come out</p> <p>12 differently. I am asking is there enough data in</p> <p>13 a smaller time period to do the same analysis?</p> <p>14 A. I am going to answer a little bit</p> <p>15 differently, but hopefully if I don't answer you,</p> <p>16 you will correct me.</p> <p>17 Q. You can be assured of that.</p> <p>18 A. Okay. So the -- as I mentioned,</p> <p>19 there's a very strong relationship between the</p> <p>20 size of the sample and the precision of the</p> <p>21 estimate meaning the credibility and certainness</p> <p>22 that you can provide in terms of what the</p> <p>23 estimate implies. So it's never a question of</p> <p>24 can you. It's a trade-off between precision and</p>	<p style="text-align: right;">Page 100</p> <p>1 Q. Okay. Why is it that you think it is</p> <p>2 appropriate to use data for the Chicago</p> <p>3 metropolitan area defined in your report as</p> <p>4 Chicago-Naperville-Joliet and apply that to the</p> <p>5 Chicago Loop?</p> <p>6 A. I wouldn't use the word appropriate.</p> <p>7 So I would say that I think it's a credible and a</p> <p>8 reasonable way to provide an estimate which is</p> <p>9 meaning credible and reasonable of the union,</p> <p>10 non-union wage differential in the Chicago Loop</p> <p>11 because that smaller geography is contained</p> <p>12 within the larger geography.</p> <p>13 There is not that much -- to the best</p> <p>14 of my knowledge, there's not that much variation.</p> <p>15 I wouldn't expect that much variation in the --</p> <p>16 to be so different in the Chicago Loop than in</p> <p>17 the larger broader area. The wages are very</p> <p>18 comparable. That's, for example, when you see --</p> <p>19 that's the prevailing wage analysis, the second</p> <p>20 analysis. This is very much evidence along the</p> <p>21 lines that my original analysis using the Current</p> <p>22 Population Survey data is with a large degree of</p> <p>23 certainty applicable to the Loop.</p> <p>24 Q. Do you currently live in the Chicago</p>
<p style="text-align: right;">Page 99</p> <p>1 estimate. So I thought in my expert opinion, the</p> <p>2 more data provided the better trade-off, and</p> <p>3 that's why I chose it, but it is possible.</p> <p>4 Q. It is possible -- it is possible that</p> <p>5 the result of the analysis would have been</p> <p>6 different had you used the data set from 2014 to</p> <p>7 2019 rather than 2011 to 2019?</p> <p>8 A. I am going to answer that it's in my</p> <p>9 opinion unlikely because I can -- in the analysis</p> <p>10 when we adjust for year, you see the effects of</p> <p>11 years. So there hasn't been great changes in any</p> <p>12 dimension of the market or even in inflation that</p> <p>13 would suggest that this would change noticeably</p> <p>14 if I had done the analysis from -- at a different</p> <p>15 period within that time period.</p> <p>16 Q. But, again, all of the data that you</p> <p>17 used and all of the analysis that you did is</p> <p>18 available -- what is the name of the software</p> <p>19 program?</p> <p>20 A. Stata, S-T-A-T-A.</p> <p>21 Q. S-T-A-T-A. All of the information</p> <p>22 that you used and all the analysis that you did</p> <p>23 is retained in your Stata software, correct?</p> <p>24 A. Correct.</p>	<p style="text-align: right;">Page 101</p> <p>1 metropolitan area?</p> <p>2 A. I do.</p> <p>3 Q. How long have you lived in the Chicago</p> <p>4 metropolitan area?</p> <p>5 A. 17 years.</p> <p>6 Q. Okay. Is it your testimony that there</p> <p>7 are no differences that are significant to your</p> <p>8 analysis between let's use as an example</p> <p>9 Naperville which is in DuPage County, Joliet</p> <p>10 which is in Will County, and the Chicago Loop in</p> <p>11 terms of union versus non-union wages?</p> <p>12 A. Can you rephrase that? I'm sorry. I</p> <p>13 wasn't paying attention, sorry.</p> <p>14 Q. And, again, I just -- you know, I am</p> <p>15 not going to try to hide the ball. In my opinion</p> <p>16 as somebody who has lived -- in my view as</p> <p>17 somebody who has lived in the Chicago</p> <p>18 metropolitan area since 1992, Joliet is a whole</p> <p>19 lot different than Naperville is a whole lot</p> <p>20 different than the Chicago Loop, and what I am</p> <p>21 trying to get at is do you feel comfortable based</p> <p>22 on your knowledge of the area, 17 years of living</p> <p>23 here, that it is appropriate to use data from</p> <p>24 Joliet and Naperville and the Chicago Loop to</p>



<p style="text-align: right;">Page 102</p> <p>1 come up with an analysis applicable to the  2 Chicago Loop for union versus non-union wages?  3 A. It's not my job to be comfortable or  4 uncomfortable with my analysis. As I stated, I  5 think my analysis applies that is a -- generally  6 would be applicable to the Loop because in my  7 expert opinion, my scientific opinion, and my  8 review of other data or knowledge, the  9 differences in wages are not extreme. For  10 example, if you look at the bullet point, it  11 says: I find that there are no statistically  12 significant or economically important differences  13 between the non-union wages in the Chicago  14 metropolitan area and the rest of the United  15 States.  16 Now to put that in context to repeat  17 your question, I don't know how your comfort  18 level is in saying that the wages in the  19 metropolitan area Chicago as defined would be --  20 non-union wages in construction would be similar  21 to the United States. You might have thought  22 otherwise. In fact, the estimate is that they  23 are the same statistically.  24 So that gives me -- that is a strong</p>	<p style="text-align: right;">Page 104</p> <p>1 may proceed.  2 BY MR. SCHUTTE:  3 Q. Dr. Kaestner, we have marked as  4 Exhibit 22 a document that has the Bates label  5 Wacker Drive 604 in the lower right corner.  6 Is this the document that were  7 referring to as the list of occupations that were  8 provided to you by plaintiff's counsel?  9 A. Yes.  10 Q. And then you took this list of  11 occupations and looked at the occupation set that  12 was available in the current population survey to  13 come up with the population -- excuse me -- with  14 the occupations that you use in Appendix A,  15 correct?  16 A. Correct.  17 Q. Okay. So we can set that aside.  18 MR. SCHUTTE: Thank you very much, Jim, for  19 pulling that together so quickly.  20 MR. ZOURAS: You are welcome.  21 BY MR. SCHUTTE:  22 Q. Okay. So before we broke, we were  23 talking about this issue about differences in  24 different areas of the United States or different</p>
<p style="text-align: right;">Page 103</p> <p>1 data point, some strong evidence to suggest that  2 the effects that I am finding would be applicable  3 more broadly, and, again, if you expand to  4 Illinois versus the United States, you would find  5 similar results in my opinion.  6 So I do think -- and, again, it's  7 my -- as my report says, I think that these  8 estimates of the union, non-union wage  9 differential that I report would be reasonable  10 and applicable to the smaller geography of the  11 Chicago Loop.  12 MR. SCHUTTE: Okay. Why don't we go off the  13 record for five minutes and take a break.  14 MR. FOSTER: Okay.  15 THE VIDEOGRAPHER: Going off the record at  16 11:52 a.m.  17 (WHEREUPON, a recess was had at  18 11:52 a.m. until 12:05 p.m.)  19 (WHEREUPON, a certain document  20 was marked Deposition Exhibit No.  21 22, for identification, as of  22 2/21/20.)  23 THE VIDEOGRAPHER: Good afternoon. We are  24 going back on the video record at 12:05 p.m. You</p>	<p style="text-align: right;">Page 105</p> <p>1 areas within the Chicago metropolitan area.  2 The analysis that you did that led you  3 to your conclusion in the third bullet in  4 paragraph 4 that there is no statistically  5 significant or economically important difference  6 in non-union wages in the Chicago metropolitan  7 area and the rest of the U.S., is the analysis  8 that you did to reach that conclusion available  9 in Stata?  10 A. Yes.  11 Q. Okay. What do you mean by  12 economically important?  13 A. Because statistical significance does  14 not necessarily mean a small or very small  15 difference. So the economically important refers  16 to that there's -- not only is it not  17 statistically significant, but it's very -- any  18 difference is very small.  19 Q. Okay. Now, back to your original  20 analysis using the CPS data.  21 After you calculated the 47 percent  22 and 38 percent -- excuse me -- 47 and 39 percent  23 numbers for the Chicago metropolitan area and  24 outside the Chicago metropolitan area, you then</p>

<p style="text-align: right;">Page 106</p> <p>1 did a further analysis where you looked at the  2 same two geographies but isolated out first age  3 and education, correct?  4 A. Yes.  5 Q. And then you also did a second  6 adjustment where you also took into account  7 gender and race?  8 A. Yes.  9 Q. Okay. And ultimately you got there a  10 difference between Chicago -- the Chicago  11 metropolitan area and the U.S. of 10 percent  12 based on age and gender and 8 percent based on --  13 excuse me -- 10 percent based on age and  14 education, and 8 percent based on gender and  15 race?  16 A. No. So let me clarify that after  17 adjusting for age and education, the difference  18 between union and non-union wages in the Chicago  19 metropolitan area was 40 percent, and after  20 adjusting for age, education, gender, and race,  21 it was 36 percent.  22 Q. Okay. But you also did the same  23 analysis outside the Chicago metropolitan area  24 and found a 30 percent adjusted for age and</p>	<p style="text-align: right;">Page 108</p> <p>1 essentially taking all 28 of the occupations in  2 Appendix A and considering that data as a group,  3 correct?  4 A. Correct.  5 Q. The next thing you want to do or the  6 next thing you try to do is to take the -- you  7 take Appendix A, page 12 of your report and you  8 take those 28 occupations and put them into eight  9 different groups; is that right?  10 A. Yes.  11 Q. Who was involved in taking the 28  12 occupations and putting them into eight groups?  13 A. Just myself.  14 Q. Okay. What was the basis for you to  15 do that?  16 A. Again, looking at the -- this was  17 using the occupational classifications of the  18 U.S. Census Bureau. These occupations were  19 grouped together because they were in similar  20 occupations -- considered as similar occupations  21 by the Bureau of Census.  22 Q. And you did that -- but you did that  23 yourself. That wasn't relying on any other  24 literature or any other analysis you had seen</p>
<p style="text-align: right;">Page 107</p> <p>1 education and 28 percent for gender and race?  2 A. Correct.  3 Q. And the difference between -- when you  4 adjust for age and education, the difference  5 between outside the U.S. and inside -- excuse  6 me -- outside the Chicago metropolitan area and  7 the Chicago metropolitan area, the difference is  8 10 percent?  9 A. After adjustment for age and  10 education, yes.  11 Q. And it's 8 percent for a further  12 adjustment for gender and race?  13 A. Yes, as it was for the estimate with  14 no adjustment for any of these factors.  15 Q. Okay. When you do the second  16 adjustment, is it an adjustment where you take  17 into account age, education, gender, and race or  18 is it just gender and race?  19 A. It is age, education, gender, and  20 race.  21 Q. Okay. So you add two more factors?  22 A. Yes.  23 Q. Okay. Now, moving forward, everything  24 we have been talking to up until now is</p>	<p style="text-align: right;">Page 109</p> <p>1 previously?  2 A. Yes, I did that myself.  3 Q. Okay. And then as I understand the  4 analysis when you break it into the eight groups,  5 there's still sufficient data set at the --  6 outside the metropolitan Chicago area to do an  7 analysis of union versus non-union, and then to  8 do the Adjustment 1 for age and education, and  9 adjustment two for age, education, gender, and  10 race, correct?  11 A. That's correct.  12 Q. Okay. But do I have it right that  13 there's not sufficient data inside the Chicago  14 metropolitan area to take it the analysis down to  15 the level of the eight groups?  16 A. Again, there's data. The word  17 sufficient goes back to the trade-off between  18 precision and -- and -- of the estimate. So in  19 my opinion there was -- the sample sizes were  20 inadequate to do the analysis just in the Chicago  21 metropolitan area. By inadequate, I mean it  22 would be lacking sufficient precision to be  23 informative.  24 Q. So what you did as a proxy is that you</p>



<p style="text-align: right;">Page 110</p> <p>1 took the -- you know that there is -- you know  2 based on your analysis that there's an 8 percent  3 difference between the Chicago metropolitan area  4 and the -- outside the Chicago metropolitan area  5 for all union -- these 828 groups and the all  6 non-union the 28 groups, and in order to -- when  7 you break it into the groups, you just make an 8  8 percent adjustment for what you find at the --  9 outside the Chicago metropolitan area; is that  10 right?  11 A. For -- that's generally correct. For  12 each of the groups, I used the data outside the  13 metropolitan area to identify the union,  14 non-union wage difference, and then I apply that  15 8 percent adjustment. An important thing that  16 you see reported is that the premium across all  17 the occupations in the metropolitan area was 43  18 percent. If I just take the average of the --  19 when I did adjusting by 8 percent was 43 percent.  20 That's remarkably similar to the 47 percent I got  21 when I didn't have to do the adjustment.  22 Q. Right.  23 A. So that implies that the 8 percent  24 adjustment factor applied individually to each of</p>	<p style="text-align: right;">Page 112</p> <p>1 Q. Okay. And then to get to Adjustment  2 2, you do the same thing. You take what you can  3 calculate based on the data available at the  4 outside the Chicago metropolitan area, and you  5 apply the difference that you have already  6 determined based on the Adjustment 2 without  7 breaking it into occupational groups; is that  8 right?  9 A. Yes, that is correct. I just want to  10 reiterate that the -- using that adjustment is  11 supported by the evidence that I mentioned prior  12 that when I can use a combined occupations, the  13 difference was 8 percent.  14 Q. Okay.  15 A. When I used the individual occupations  16 and applied the adjustment and then combined them  17 subsequently, I get 43 percent which is again  18 very close to the 47 percent. Strongly suggests  19 that there is no -- that the use of this  20 adjustment factor is very credible and  21 appropriate.  22 MR. SCHUTTE: Okay. Could we mark this as  23 Exhibit 23.  24</p>
<p style="text-align: right;">Page 111</p> <p>1 these occupations is very credible and really is  2 not an issue in terms of being applicable to each  3 individual occupation.  4 Q. But you applied that 8 percent  5 adjustment at the occupational group level  6 because in your expert opinion, there was not  7 sufficient data to be precise if you looked at  8 actually doing the calculation at the group level  9 in the Chicago metropolitan area, correct?  10 A. Yes.  11 Q. Okay. Then you used the same  12 approach, did you not, to get to a Chicago  13 metropolitan group level for Adjustment 1 for age  14 and education; that is, you were able to  15 calculate the difference between the Chicago  16 metropolitan area and outside the Chicago  17 metropolitan area based on all 28 of the  18 occupations, and that it was a -- what, that was  19 a 10 percent difference, and so you then apply  20 that -- you then run the same data at the group  21 level, and you apply that 10 percent adjustment,  22 correct?  23 A. Yes, in that column called -- in  24 column in Table 1 under the column Adjustment 1.</p>	<p style="text-align: right;">Page 113</p> <p>1 (WHEREUPON, a certain document  2 was marked Deposition Exhibit No.  3 23, for identification, as of  4 2/21/20.)  5 BY MR. SCHUTTE:  6 Q. Dr. Kaestner, what we have marked as  7 Exhibit 23 is a full page blowup of Table 1 from  8 your report page 6, and the reason we did that is  9 so that I can -- without having to flip back and  10 forth, we can refer to the report and Table 1 at  11 the same time. Do you understand what I am  12 saying?  13 A. Thanks, yes.  14 Q. Okay. Sure. Help me out please with  15 something which I was not able to do on my own.  16 Can you walk me -- the last paragraph  17 on page 5 where you say the results are shown in  18 Table 1, can you please show me and walk us  19 through how that paragraph correlates with Table  20 1 because I just can't follow? And let me try to  21 guide you through.  22 MR. FOSTER: I am sorry. Which paragraph?  23 BY MR. SCHUTTE:  24 Q. The last paragraph on page 5. The</p>

<p style="text-align: right;">Page 114</p> <p>1 results as shown in Table 1.</p> <p>2 You say: "As noted, estimates for the</p> <p>3 Chicago metropolitan area are calculated by</p> <p>4 adding either 8 percent to the estimates for the</p> <p>5 U.S. (columns 2 and 3) or 10 percent (column 2)."</p> <p>6 I understand that in Exhibit 23 that</p> <p>7 when you do the occupational group analysis, you</p> <p>8 can take the carpenter number from the union wage</p> <p>9 premium in the U.S., add 8 percent, and get to</p> <p>10 50, and I can go down that column and get 28 add</p> <p>11 8, 36, etc. My question is: What do you mean</p> <p>12 when you say by adding 8 percent to the estimates</p> <p>13 for the U.S. columns 2 and 3?</p> <p>14 A. Yeah, just give me a second. Thank</p> <p>15 you.</p> <p>16 Q. Okay. Of course, take as much time as</p> <p>17 you need.</p> <p>18 A. Yeah, so what is missing in these</p> <p>19 calculations. So you can see that in Table 1,</p> <p>20 Column 1.</p> <p>21 Q. May I interrupt you?</p> <p>22 A. Yes.</p> <p>23 Q. When you say Table 1, Column 1, is</p> <p>24 that the column that says Occupational Group?</p>	<p style="text-align: right;">Page 116</p> <p>1 Column 4 is the Union Wage Premium in</p> <p>2 Metropolitan Chicago Adjustment 1 and then union</p> <p>3 wage -- in Column 5 the Union Wage Premium</p> <p>4 Chicago Adjustment 2. Those are calculated</p> <p>5 similarly by adding 10 percent in Column 4 and 8</p> <p>6 percent in Column 5 to numbers that aren't in the</p> <p>7 table. Okay.</p> <p>8 So I don't have a comparable Column 2</p> <p>9 that's reported in the table. So I didn't report</p> <p>10 the comparable Column 2 estimates that refer --</p> <p>11 that would be analogous to Columns 4 and 5 as</p> <p>12 Column 3 is analogous to Column 2. So that's an</p> <p>13 oversight or -- but that's how they are --</p> <p>14 Q. Is there a reason why you did not</p> <p>15 include the -- so let me make sure I understand</p> <p>16 what you did.</p> <p>17 So for Column 4 you took a calculation</p> <p>18 at the occupational group level with Adjustment 1</p> <p>19 at the U.S. level which is not presented in the</p> <p>20 chart, you added the 10 percent that we derived</p> <p>21 from the analysis on page 4 and 5 to get to the</p> <p>22 numbers that are in Column 4, correct?</p> <p>23 A. That is correct.</p> <p>24 Q. And for Column 5 you added 8 percent</p>
<p style="text-align: right;">Page 115</p> <p>1 A. No, I'm sorry. In Table 1 in the</p> <p>2 column labeled Union Wage Premium in U.S.</p> <p>3 Q. What are we going to call that Column</p> <p>4 1 or 2?</p> <p>5 A. Let's call it Column 2. Thank you.</p> <p>6 Okay. And then if you look at Column 3 labeled</p> <p>7 Union Wage Premium in Metropolitan Chicago area,</p> <p>8 you will see that the difference between Column 2</p> <p>9 and Column 3 is always 8 percent.</p> <p>10 Q. Yes.</p> <p>11 A. Okay. And that refers to the 8</p> <p>12 percent premium that is in Chicago relative to</p> <p>13 the rest of the -- 8 percent difference in the</p> <p>14 union, non-union wage (reporter clarification).</p> <p>15 Sorry, so the 8 percent that is added to Column 3</p> <p>16 from adding Column 2 plus 8 percent equals Column</p> <p>17 3.</p> <p>18 Q. I am fully with you at that point.</p> <p>19 A. Okay. So I am just repeating for</p> <p>20 recorder.</p> <p>21 Q. I appreciate that, but I understand --</p> <p>22 A. And then so that's the 8 percent</p> <p>23 previously referred to.</p> <p>24 So column -- what we are going to call</p>	<p style="text-align: right;">Page 117</p> <p>1 to a calculated occupational group level U.S.</p> <p>2 wide with the Adjustment 2, but that's not</p> <p>3 reported in the chart?</p> <p>4 A. That's correct. They can be derived</p> <p>5 if you just subtract 10 from Column 4 or 8 from</p> <p>6 Column 2.</p> <p>7 Q. Is there a reason why you didn't put</p> <p>8 the U.S. wide level for Adjustment 1 and</p> <p>9 Adjustment 2 in the chart?</p> <p>10 A. No particular reason.</p> <p>11 Q. Okay. When you go back and look</p> <p>12 though at the text of the last paragraph on</p> <p>13 paragraph 5, what did you mean when you said: As</p> <p>14 noted, estimates for the Chicago metropolitan</p> <p>15 area are calculated by adding 8 percent to the</p> <p>16 estimate for the U.S. (columns 2 or 3). I get</p> <p>17 that, and then you say or 10 percent for Column</p> <p>18 2?</p> <p>19 A. So I'm sorry the columns have been</p> <p>20 referred to imprecisely, but we just went through</p> <p>21 it. So column -- so there is only two numbers.</p> <p>22 We either add 8 percent -- I either added 8</p> <p>23 percent or 10 percent. I added 8 percent into</p> <p>24 the Column 2 numbers to get Column 3, and that</p>

<p style="text-align: right;">Page 118</p> <p>1 was based on estimates reported.</p> <p>2 In Column 4 I add 10 percent to</p> <p>3 numbers that are not reported, and then in Column</p> <p>4 5 I add 8 percent again because that's the</p> <p>5 differential between Chicago and the rest of the</p> <p>6 United States that occurs in Adjustment 2 which</p> <p>7 happens to be coincident with the difference</p> <p>8 between Chicago and the rest of the United States</p> <p>9 in Column 3.</p> <p>10 Q. Okay. So in that last paragraph of</p> <p>11 page 5 where you say: As can be observed --</p> <p>12 excuse me -- as noted, estimates for the Chicago</p> <p>13 metropolitan area are calculated by adding either</p> <p>14 8 percent to the estimates for the U.S., and when</p> <p>15 you say Columns 2 and 3, you are referring to the</p> <p>16 columns Union Wage Premium in the U.S. as Column</p> <p>17 2, Union Wage Premium in Metropolitan Chicago as</p> <p>18 three, and then you say or 10 percent. What</p> <p>19 should that say -- not Column 2, what should it</p> <p>20 say?</p> <p>21 A. I want to know if you are -- I think</p> <p>22 the point of this questioning is to make sure you</p> <p>23 understand what's in the columns.</p> <p>24 Q. Oh, no, now I understand what's in the</p>	<p style="text-align: right;">Page 120</p> <p>1 are now referring to Column 5? Column 5 --</p> <p>2 Q. I understand how to you got to Column</p> <p>3 5.</p> <p>4 A. Okay.</p> <p>5 Q. I just don't understand how --</p> <p>6 candidly, I don't understand how in a report of</p> <p>7 this importance you could make the error on page</p> <p>8 5 that doesn't line up with the chart on page 6.</p> <p>9 Did you notice that error when you</p> <p>10 reviewed your report in preparation for your</p> <p>11 deposition today?</p> <p>12 A. I did not.</p> <p>13 Q. Okay. What do you mean when you used</p> <p>14 the term at the bottom of the page 5 "vary</p> <p>15 modestly"?</p> <p>16 MR. SCHUTTE: V-A-R-Y, Andrea, vary</p> <p>17 modestly.</p> <p>18 BY THE WITNESS:</p> <p>19 A. Well, we don't have to refer to the</p> <p>20 word. I tell you exactly what the numbers are.</p> <p>21 So they are -- you know, the numbers are between</p> <p>22 36 and 50 for the estimates listed in the table</p> <p>23 or between 24 and 46. So that's exactly what I</p> <p>24 mean those ranges.</p>
<p style="text-align: right;">Page 119</p> <p>1 columns --</p> <p>2 A. Okay. Now --</p> <p>3 Q. I am wondering how a mistake like that</p> <p>4 got made --</p> <p>5 A. Can I -- I don't think it was a</p> <p>6 mistake. There's no mistake in the report in</p> <p>7 terms of the estimates reported in Table 1. So</p> <p>8 these are all valid estimates that can be -- that</p> <p>9 are in the Stata data set and can be retrieved</p> <p>10 from that and replicated.</p> <p>11 Q. Okay. So that was one of my</p> <p>12 questions. So everything that's reflected in</p> <p>13 Table 1 is available in the Stata data set and</p> <p>14 can be replicated?</p> <p>15 A. Correct.</p> <p>16 Q. Okay. But you will agree with me,</p> <p>17 will you not, that the reference to other 10</p> <p>18 percent, Column 2 is a mistake. It should be or</p> <p>19 10 percent, Column 4?</p> <p>20 A. I am guilty of mislabeling columns.</p> <p>21 Q. Okay. And then there's no reference</p> <p>22 to how you got to Column 5?</p> <p>23 A. There is. It is just poorly written,</p> <p>24 and do you want me to explain how I got what we</p>	<p style="text-align: right;">Page 121</p> <p>1 BY MR. SCHUTTE:</p> <p>2 Q. Yeah, I understand the ranges, but I</p> <p>3 am questioning the term you applied to them.</p> <p>4 Is it your testimony as an expert in</p> <p>5 labor economics that a variance between 36 to 50</p> <p>6 percent is a modest variance?</p> <p>7 A. I don't have any expert opinion on</p> <p>8 what the word modest means.</p> <p>9 Q. Well, I know. I am asking what you --</p> <p>10 A. I used the word modest to refer to the</p> <p>11 ranges that are in the table. So I provided the</p> <p>12 ranges, and that's what I -- they range from 24</p> <p>13 to 40 -- to 42 from -- in Column 5, from 27 to 46</p> <p>14 in Column 4, from 30 to 50 in Column 3. So</p> <p>15 that's what I...</p> <p>16 Q. I am going to stick my neck out and</p> <p>17 ask a question that I may be completely showing</p> <p>18 my ignorance of statistics.</p> <p>19 Did you calculate a p-value of the</p> <p>20 difference between 36 and 50 percent?</p> <p>21 A. I did not.</p> <p>22 Q. Could you?</p> <p>23 A. No, because these are -- these are</p> <p>24 separate regression estimates. So I could apply</p>

<p style="text-align: right;">Page 122</p> <p>1 a statistical formula, but I didn't and it's not 2 standard to do so. 3 Q. When you did the calculations that you 4 used to get to the data on Table 1, can you 5 describe the statistical approach you used? Was 6 it a regression analysis? 7 A. Yes, it was a regression analysis. 8 Q. Okay. And is there -- for purposes of 9 someone who is a statistical expert who will 10 review this transcript, can you describe in more 11 detail the statistical analysis that you did? 12 A. The statistical analysis is a very 13 standard, one of the work horse types of analyses 14 that occur in labor economics. It's called a 15 wage analysis. The dependent variable is the 16 natural logarithm of the wage. The independent 17 variables are an indicator for union, non-union 18 coverage of a worker. 19 Then you have a -- and that's the 20 first analysis and an indicator for Chicago or in 21 the national analysis or the rest of the United 22 States, indicators for what year the data come 23 from. So that -- indicators for whether the wage 24 was reported as an hourly wage or a weekly wage,</p>	<p style="text-align: right;">Page 124</p> <p>1 alternative estimates of the union wage premium 2 adjusting for age, education, gender and race." 3 So that people -- so the word 4 productivity is used for a different amount of 5 output per hour. That's how productivity is 6 measured, the output of labor per hour. 7 Q. And how is the amount -- you said -- 8 you defined productivity is the amount of output 9 per hour. 10 How is -- how is any of the following 11 related to amount of productivity per hour: Age, 12 education, gender, or race? 13 A. I don't think there's much direct 14 evidence that these factors are directly related 15 to output per hour. There's not that many 16 studies that can measure output per hour of a 17 worker in terms of these demographics. So it's 18 very there's -- no direct evidence or there's 19 none that I am aware of that would be applicable 20 in this case. So that's the first part of the 21 answer. 22 The second part is there is, for 23 example, people who make more money, usually have 24 higher education as professors and attorneys</p>
<p style="text-align: right;">Page 123</p> <p>1 and then you estimate a regression analysis or 2 ordinary least squares regression analysis that 3 calculates the effect of being covered by a union 4 on wages, and that's an estimate of the 5 difference between the union and the non-union 6 wage. 7 Q. Okay. I want to talk for a bit 8 about -- you use the term in page 4 and elsewhere 9 of productivity differences. I am specifically 10 referring to the last paragraph on page 4 you say 11 that: "Because there are demographic differences 12 between union and non-union workers that may be 13 related to productivity differences." 14 What do you mean by productivity 15 differences there? 16 A. So let me read the full sentence. 17 Q. Of course. 18 A. "Because there are demographic 19 differences between union" -- (reporter 20 clarification). "Because there are demographic 21 differences between union and non-union workers 22 that may be related to productivity differences, 23 although the evidence to substantiate this claim 24 is not extensive or uniform, I obtained</p>	<p style="text-align: right;">Page 125</p> <p>1 compared to carpenters. So some -- there is a 2 hypothesis, a view that because you have more 3 education, you are more productive, and that's 4 why you make more money, but that is -- the 5 assumption is that you are more productive. The 6 evidence to actually measure that is not direct. 7 Q. Okay. But isn't the apt analysis when 8 you are using union versus non-union, not 9 attorneys and professors on one hand and the 10 carpenter on another. It's a carpenter with a 11 college degree versus a carpenter with a high 12 school degree? 13 A. I'm sorry. Can you rephrase it or 14 have the -- 15 Q. I am happy to rephrase it. 16 You said that there is a hypothesis, 17 and I take it you don't -- you said you have seen 18 no direct evidence related to this but -- well, 19 strike that. 20 You used an example a moment ago that 21 there is an assumption that could be made that 22 attorney who is an attorney or a professor has a 23 higher level of education than a carpenter, and 24 my question is: Isn't the more apt analysis the</p>

<p style="text-align: right;">Page 126</p> <p>1 question of whether a carpenter with a higher 2 level of education is more productive in terms of 3 amount of output per hour than a carpenter with a 4 high school education? 5 A. I think that's correct. That's a 6 hypothesis, and that's why I made these 7 adjustments to address that possibility. 8 Q. Okay. Are you aware of any literature 9 or research that discusses whether union workers 10 because they are in a union are more productive 11 than non-union workers? 12 A. Again, in terms of literature there 13 are people who have written on this issue, but in 14 terms of direct evidence that I would assert as 15 credible as the estimates in my report, I don't 16 think there's any credible direct evidence that 17 union workers are more productive in terms of 18 actual estimates. There is hypothesis and 19 argument, but this is made on both sides. 20 Q. When you say that the -- what do you 21 mean when you say that the analysis in your 22 report is -- do you mean the analysis where you 23 do not adjust for age, gender, education, or 24 race?</p>	<p style="text-align: right;">Page 128</p> <p>1 Q. Is there any literature that you saw 2 that used age or gender or education or race as a 3 proxy for productivity? 4 A. As I say, the standard analysis in -- 5 a standard analysis is to adjust for these 6 factors because of the potential for these 7 factors to effect productivity which is 8 indirectly established by observing that they get 9 paid more. 10 So if they get paid more, therefore, 11 they are more productive. It's a little bit 12 tautological because the actual productivity of 13 the workers is rarely, if ever, measured 14 directly. For example, I think there might be a 15 study of pear pickers in California that measure 16 productivity in terms of agricultural -- number 17 of bushels, but that would be the extent of the 18 type of study. 19 Q. Right, but what I am not following, 20 Dr. Kaestner, is that in that study, you could 21 take a union pear picker and find out the union 22 pear picker picks 100 pears per hour and is paid 23 a higher wage and find a non-union pear picker 24 who picks 75 pears per hour and is paid a lower</p>
<p style="text-align: right;">Page 127</p> <p>1 A. No, I say that the hypothesis or to 2 test -- the empirical analysis, the empirical 3 studies. There is a lack of empirical studies 4 that have the same amount of certainty and 5 precision or even what we call a credible 6 research design that can answer the question of 7 whether union and non-union workers are equally 8 productive. It may sound surprising and it's -- 9 but it is, in fact, the case. 10 Q. Did you do any survey of the 11 literature to try to determine whether there was 12 any academic literature out there about the 13 productivity of union versus non-union workers 14 that was not based on age, education, gender, or 15 race? 16 A. I reviewed the literature looking for 17 direct evidence of the differences in 18 productivity between union and non-union workers 19 ideally in construction, but I didn't find any 20 studies that I felt were -- that meet the 21 criteria of professional journals, for example, 22 academic journals that I have referred to for 23 other pieces of evidence to provide that type of 24 evidence.</p>	<p style="text-align: right;">Page 129</p> <p>1 wage. 2 I don't understand how age, gender, 3 education, or race plays into that on either side 4 of the equation. It seems to me that you don't 5 think it does either. 6 A. I think there's a potential that -- 7 there's a potential and belief among many 8 economists that these may be proxies for 9 productivity differences, and that's why I 10 included them as an adjustment and to present 11 that evidence, and I think the important point to 12 note is that they don't do much in terms of -- 13 and, again, I don't want to argue about what much 14 is. The estimates are there that in one case 15 it's 47 percent adjusting for education and age 16 is 40 percent adjusting for age, education and 17 education I think is 36 percent, and then I would 18 argue, as I did in the report, that it's not 19 clear that these adjustments are necessary or 20 particularly valid that where you would prefer 21 one over the other. I think what's important is 22 the range of estimates is relatively close 23 meaning 36 to 47. 24 Q. Let me cut to the chase.</p>



<p style="text-align: right;">Page 130</p> <p>1 At the end of your report, you suggest</p> <p>2 that the model that ought to be used by the judge</p> <p>3 that can be used to determine damages on a</p> <p>4 class-wide basis is you take the union wage</p> <p>5 premium from Table 1, and then you apply it to</p> <p>6 the work done by the people in the various</p> <p>7 occupational groups on a project, and you will</p> <p>8 come up with a number that is attributable to the</p> <p>9 union wage gap; is that right?</p> <p>10 A. Generally that's correct. You would</p> <p>11 take each -- the cost -- the payments made to the</p> <p>12 various categories of labor in Table 1 and then</p> <p>13 apply these union wage --</p> <p>14 Q. And we will talk about the Illinois</p> <p>15 Department of Labor analysis, but you are</p> <p>16 recommending that the judge should use Table 1,</p> <p>17 not Table 2, correct?</p> <p>18 That's what you say on page 9 of the</p> <p>19 complaint. You say that for each of the</p> <p>20 categories of labor, the non-union cost of that</p> <p>21 labor can be calculated by dividing the union</p> <p>22 cost of that type of labor by the corresponding</p> <p>23 union wage premium in Table 1.</p> <p>24 MR. FOSTER: You said complaint.</p>	<p style="text-align: right;">Page 132</p> <p>1 right now which is you are recommending to the</p> <p>2 judge on page 9 -- you don't say one way to do</p> <p>3 it. You say: "The damages for each potential</p> <p>4 class member can be estimated using the evidence</p> <p>5 on the differences in the cost of union and</p> <p>6 non-union labor presented in Table 1," and then</p> <p>7 you go on to demonstrate exactly how mechanically</p> <p>8 that approach would be applied, correct?</p> <p>9 A. Correct.</p> <p>10 Q. We will talk about Table 2, but you</p> <p>11 don't recommend to use Table 2. You recommend</p> <p>12 Table 1, correct?</p> <p>13 A. In that segment, yes.</p> <p>14 Q. Yes. And which column -- using</p> <p>15 Exhibit 23, which column from Table 1 are you</p> <p>16 recommending that the judge use for a class-wide</p> <p>17 damages analysis: Column 2, Column 3, Column 4,</p> <p>18 or Column 5?</p> <p>19 A. I recommend using estimates in Table</p> <p>20 1, and so if you -- what I would do first I would</p> <p>21 use column -- what we are referring to as Column</p> <p>22 3 but -- and that's because of the tentative link</p> <p>23 between -- between productivity and these</p> <p>24 factors. That's more hypothesis that there's no</p>
<p style="text-align: right;">Page 131</p> <p>1 MR. SCHUTTE: Oh, I'm sorry. I misspoke</p> <p>2 then.</p> <p>3 MR. FOSTER: It's not in the complaint.</p> <p>4 BY MR. SCHUTTE:</p> <p>5 Q. Let me rephrase the question.</p> <p>6 What you are recommending in an expert</p> <p>7 opinion to the judge is that to get to a</p> <p>8 class-wide damages model that for each category</p> <p>9 of labor, each occupational group, you can take</p> <p>10 Table 1, the union premium, and multiply that by</p> <p>11 the work that was done by that occupational group</p> <p>12 and you can get to the difference that the</p> <p>13 person -- the entity would have paid had they not</p> <p>14 used union workers. That's at the end of the day</p> <p>15 what you are suggesting.</p> <p>16 A. That's what I say is one approach, and</p> <p>17 so I say one can do it this way, and also -- but</p> <p>18 I think it's important to -- and so that's --</p> <p>19 yes, but I also think it's important to note the</p> <p>20 other parts of the expert report that say that</p> <p>21 Table 1 based on the other evidence presented</p> <p>22 appears to be a conservative estimate.</p> <p>23 Q. Right. I'm actually not -- I am</p> <p>24 actually just going mechanically to something</p>	<p style="text-align: right;">Page 133</p> <p>1 concrete evidence, and so that would suggest that</p> <p>2 column -- what we are referring to as Column 3</p> <p>3 labeled Union Wage Premium in Metropolitan</p> <p>4 Chicago would be appropriate and reasonable</p> <p>5 estimates to use.</p> <p>6 Q. Okay. My last question and we can</p> <p>7 take lunch is I think you said something, and</p> <p>8 correct me if I am wrong, please, that the</p> <p>9 Adjustment 2 had very little effect.</p> <p>10 Did you say something to that effect?</p> <p>11 A. We can just compare. I don't -- so</p> <p>12 unfortunately I am not an attorney, and my</p> <p>13 language gets somewhat imprecise, and I apologize</p> <p>14 for that, but we can just look at Columns 3, 4,</p> <p>15 and 5 to observe the differences that are about</p> <p>16 the estimates of the union wage differential. So</p> <p>17 in -- between union and non-union labor. So if</p> <p>18 you have a question about those differences, I am</p> <p>19 happy to answer them.</p> <p>20 Q. But my question is simply this the</p> <p>21 Adjustment 2 in several of the rows for several</p> <p>22 of the occupational groups the amount of the</p> <p>23 Union Wage Premium in Metropolitan Chicago with</p> <p>24 Adjustment 2 is actually the same as or only</p>

<p style="text-align: right;">Page 134</p> <p>1 slightly higher than the Union Wage Premium in 2 the U.S. 3 In other words, whereas Columns 3 and 4 Columns 4 -- actually, Column 3 in particular has 5 a significant -- an 8 percent difference. Column 6 5 actually has some occupational groups where the 7 union wage different premium in metropolitan 8 Chicago with Adjustment 2 gets you to a place 9 where it's the same as the Union Wage Premium in 10 the U.S.? 11 A. Except that's an incorrect calculation 12 because, as we have established before, the 13 analogous estimates to Column 2 for Adjustment 1 14 and 2 were not included in the table. So that 15 they can be calculated by just subtracting 10 16 from the Column 4 estimates labeled Union Wage 17 Premium Metropolitan Chicago Adjustment 1. For 18 example, carpenter 44 percent minus 10 would be 19 34 percent. So the analogous estimate for that 20 to Column 2 would be 34 and not 42 so -- 21 Q. Okay. 22 A. -- I apologize for the lack of 23 clarity. 24 MR. SCHUTTE: Got you. Why don't we take a</p>	<p style="text-align: right;">Page 136</p> <p>1 besides you mentioned the study about pear 2 picking. Did you attempt to identify any studies 3 that looked at union versus non-union 4 productivity on using your definition amount of 5 output per hour? 6 MR. FOSTER: Objection, asked and answered. 7 You can answer. 8 BY THE WITNESS: 9 A. I did look, and I did not find any, 10 and I will just modify. I didn't find any that 11 directly measured the productivity of union 12 versus non-union workers. 13 MR. SCHUTTE: 24. 14 (WHEREUPON, a certain document 15 was marked Deposition Exhibit No. 16 24, for identification, as of 17 2/21/20.) 18 BY MR. SCHUTTE: 19 Q. Dr. Kaestner, we have marked as 20 Exhibit 24 a document that is -- it's an article 21 titled Further Evidence on Union Efficiency in 22 Construction, Steven G. Allen from the spring 23 1988 edition of Industrial Relations, and I 24 believe this is an article -- it's an article</p>
<p style="text-align: right;">Page 135</p> <p>1 lunch break. 2 THE VIDEOGRAPHER: Going off the video 3 record at 12:45 p.m. 4 (WHEREUPON, a recess was had at 5 12:45 p.m. until 1:35 p.m.) 6 THE VIDEOGRAPHER: We are back on the video 7 record at 1:35 p.m. You may proceed. 8 BY MR. SCHUTTE: 9 Q. Dr. Kaestner, before we broke, we were 10 talking about productivity. 11 Did you identify or could you identify 12 for us a single study that linked age, education, 13 race, or gender to productivity? 14 A. I did not uncover one directly as it 15 applies to union labor but -- 16 Q. Because I read a great number of the 17 studies that you cited, and some of them talked 18 about those four demographics, but I read those 19 more as making sure that something wasn't going 20 on besides union versus non-union as opposed to 21 those being a proxy for productivity. 22 Is that how you read them? 23 A. No. 24 Q. Okay. Did you identify any studies</p>	<p style="text-align: right;">Page 137</p> <p>1 that was cited in your reference section. 2 Is this an article that you reviewed 3 in connection with your report? 4 A. I don't think this is the same 5 article. Let's be sure of that first of all. 6 Q. If you take a look at page 10 of your 7 report, the References section, the second 8 article down Allen Steven G. -- 9 A. Yes, I see it now. 10 Q. Yes. So did you review this article? 11 A. No, this is a not an article I 12 reviewed. There should be an A or a B. So when 13 I use the Allen article and reference the Allen 14 article in the report, I was referring to the 15 first one, the Allen -- Steven G. Allen 1988. 16 You will note they both have 1988 on it. So it's 17 really the first one that is the reference used 18 in the report to support my statements -- 19 Q. Right. 20 A. -- and if we want to find the 21 statement I used to report that or -- that's in 22 the literature section. 23 Q. How did Exhibit 24 get on the 24 reference list then if it's not an article that</p>



<p style="text-align: right;">Page 138</p> <p>1 you reviewed in connection with your report?</p> <p>2 A. Because I was probably copying</p> <p>3 citations, and it si an Allen '88 citation, and</p> <p>4 it was a mistake.</p> <p>5 Q. Okay. Well, I take it then you</p> <p>6 haven't read this Exhibit 24 article by</p> <p>7 Mr. Allen?</p> <p>8 A. Not that I recall reading it</p> <p>9 explicitly, no.</p> <p>10 Q. Is Industrial Relations a</p> <p>11 peer-reviewed journal?</p> <p>12 A. Yes.</p> <p>13 Q. Do you find it to be -- recognize it</p> <p>14 as a credible journal?</p> <p>15 A. Yes.</p> <p>16 Q. Okay. Mr. Allen writes in his report</p> <p>17 that the very first sentence of the text is:</p> <p>18 "Previous estimates of construction union</p> <p>19 productivity on projects built in the early '70s</p> <p>20 show 30 percent greater per activity per union</p> <p>21 compared to non-union contractors in commercial</p> <p>22 office building construction, but there was no</p> <p>23 union-non-union difference in school</p> <p>24 construction," and it is citing a prior Allen</p>	<p style="text-align: right;">Page 140</p> <p>1 Q. How do you -- or how are you able to</p> <p>2 criticize this article when you haven't read it?</p> <p>3 A. Because this is a common approach</p> <p>4 that's been used. It's used in more</p> <p>5 macroeconomic analysis, and so I don't want to be</p> <p>6 critical of this article per se. I am saying</p> <p>7 this of genre of article I don't think it</p> <p>8 represents direct evidence of the impact because</p> <p>9 it's -- again, it's -- we can -- I can support</p> <p>10 that a little bit more if you would like, but I</p> <p>11 see a very fundamental difference between this</p> <p>12 article and what I would consider direct evidence</p> <p>13 of the output per worker and the difference</p> <p>14 between that for union and non-union -- non-union</p> <p>15 workers.</p> <p>16 Q. This article is looking at a random</p> <p>17 sample of 75 projects and specifically looking at</p> <p>18 square footage of production per hour union</p> <p>19 versus non-union. Isn't that pretty specific</p> <p>20 data?</p> <p>21 A. No, because it's at the -- it's at a</p> <p>22 very aggregate level. Anyway, I haven't read it.</p> <p>23 So that's my comment that stands as that so.</p> <p>24 Q. What other articles -- what articles</p>
<p style="text-align: right;">Page 139</p> <p>1 piece.</p> <p>2 I take it that you didn't read -- you</p> <p>3 didn't dig into these prior estimates of</p> <p>4 construction union productivity?</p> <p>5 A. Actually I did consider this type of</p> <p>6 evidence as presented in this paper, and this --</p> <p>7 I rejected using this type of evidence because</p> <p>8 it's not a direct estimate of the effect of union</p> <p>9 workers. You will note it's based on highly</p> <p>10 aggregate data not -- with what I would consider</p> <p>11 not credible measurement estimates. So I did --</p> <p>12 and so when I refer to direct evidence, I don't</p> <p>13 think this is a credible kind of study to do so.</p> <p>14 That's why I didn't pursue this --</p> <p>15 Q. But --</p> <p>16 A. This is a -- can I just finish? I'm</p> <p>17 sorry.</p> <p>18 This is a very different type of</p> <p>19 analysis. This is not an analysis of</p> <p>20 productivity per se. It uses aggregates at</p> <p>21 the -- large aggregate numbers. We can find the</p> <p>22 data source, but anyway that's my general</p> <p>23 criticism of this, and that's why I didn't pursue</p> <p>24 this type of study.</p>	<p style="text-align: right;">Page 141</p> <p>1 did you consider on whether productivity should</p> <p>2 be taken into account in your model that you then</p> <p>3 rejected?</p> <p>4 A. First of all, I'd rephrase your</p> <p>5 question, if you don't mind, that productivity</p> <p>6 should be considered. It's just that there</p> <p>7 that's no evidence of productivity differences --</p> <p>8 direct evidence between productivity differences</p> <p>9 between -- direct evidence between union and</p> <p>10 non-union labor. So notwithstanding the claim of</p> <p>11 this article that it's applicable.</p> <p>12 Q. What direct evidence would you be</p> <p>13 looking for?</p> <p>14 A. For example, I think the pear picker</p> <p>15 evidence is a good -- would be a good example.</p> <p>16 Q. What is the approach that Mr. Allen</p> <p>17 used in Exhibit 24?</p> <p>18 A. I --</p> <p>19 MR. FOSTER: I object. If you want to ask</p> <p>20 him questions about this article which he says he</p> <p>21 hasn't read, you want to give him some time to</p> <p>22 look at it because I don't think it's fair for</p> <p>23 you to ask -- to quiz him about it if he says he</p> <p>24 hasn't read it.</p>

<p style="text-align: right;">Page 142</p> <p>1 MR. SCHUTTE: I would expect that any 2 document that he put on his reference list, and I 3 asked him earlier today if documents were on 4 there for a reason. He said they were on there 5 because I considered them -- 6 MR. FOSTER: He said it was a mistake. So 7 you want to take a break and let him read it? 8 MR. SCHUTTE: It's a mistake that an article 9 that's on point about productivity in the 10 construction industry -- let's strike that -- 11 MR. FOSTER: If you want to ask questions, 12 why don't we give him a few minutes to read it. 13 It's short. 14 MR. SCHUTTE: No, we are not going to do 15 that. If he has any -- he put it on his 16 reference list but didn't bother to read it. We 17 will just leave it at that. 18 I am going to mark this as Exhibit 25, 19 and I do not have a courtesy copy of this one, 20 but I am going to ask quick questions about it. 21 (WHEREUPON, a certain document 22 was marked Deposition Exhibit No. 23 25, for identification, as of 24 2/21/20.)</p>	<p style="text-align: right;">Page 144</p> <p>1 break. 2 MR. FOSTER: He says he wants a break. 3 MR. SCHUTTE: I am not agreeing to a break 4 right now. I'm not asking any further questions 5 about Exhibit 24. If you want to take a break 6 before you ask questions, that's fine. I am 7 moving on -- 8 MR. FOSTER: You said at the beginning if he 9 wanted to take a break, he could. 10 MR. SCHUTTE: Then you can ask him questions 11 about this after we get to your portion of the 12 exam. I am done with Exhibit 24. 13 BY MR. SCHUTTE: 14 Q. Before I go to Exhibit 25, just to get 15 this straight, Dr. Kaestner, you attempted in 16 your analysis to take productivity into account 17 by using age, education, race, and gender as a 18 proxy, didn't you? 19 A. In my analysis I -- in one version of 20 it, I adjusted for age, education, race, and 21 gender to address the hypothesis, the claim that 22 these might be related to productivity 23 differences between union and non-union wages, 24 and I reported the estimates with and without</p>
<p style="text-align: right;">Page 143</p> <p>1 MR. FOSTER: Before we start, do you want to 2 take a break to discuss this? 3 THE WITNESS: I could take five minutes, but 4 I could offer something now. So I am going to 5 offer something now. 6 MR. SCHUTTE: I have no question pending. I 7 will just point out for the record that it was a 8 document that was -- 9 MR. FOSTER: You don't have to keep pointing 10 out for the record. It's on the record. 11 MR. SCHUTTE: How about this, how about I 12 finish what I am going to before you start saying 13 what you are going to say. It's on the reference 14 list. I asked questions about it. He says he 15 hasn't reviewed it. I am done with it. If you 16 want to ask him on redirect about it -- 17 MR. FOSTER: Okay. You said if you wanted 18 that take a break, he could. Do you want to take 19 a break? 20 MR. SCHUTTE: I don't -- I am withdrawing 21 any further questions about this. 22 MR. FOSTER: Do you want to take a break, 23 Professor? 24 THE WITNESS: Yes, I would like a ten-minute</p>	<p style="text-align: right;">Page 145</p> <p>1 those adjustments. 2 And my further statement was that 3 there's no direct evidence, including the 4 evidence in Allen '88 that was inadvertently 5 listed on my -- in my report of the effect of 6 age, education, race, or gender on productivity. 7 Q. Exhibit 25 is an article from a book 8 article or chapter is called Developments in 9 Collective Bargaining and Construction in the 10 1980s and 1990s from a book called Contemporary 11 Collective Bargaining in the Private Sector. 12 Did you review this article in 13 connection with your report? 14 A. I reviewed -- yes, I reviewed some of 15 the tables or the reported -- yes, for example, 16 Table 3 I think was -- no -- yes, so I did review 17 this and Table 4 is the key estimates that I 18 relied on and reported these estimates. 19 Q. Did you read the entire article? 20 A. Yes. 21 Q. Okay. Did you read the section at 22 page 430 and 431 titled Productivity? 23 A. As I said, I read the entire article. 24 So those are a part of it, yes.</p>

<p style="text-align: right;">Page 146</p> <p>1 Q. And those are articles by -- it is  2 describing articles about whether there is a  3 measure of productivity on -- by union workers as  4 opposed to non-union workers. It's a survey of  5 all the prior literature on that issue, is it  6 not?  7 A. It's a survey of the literature that  8 uses a particular approach that was in the study.  9 So I don't know if it was all of the literature,  10 but it reviews some studies, mostly his own.  11 Q. Did you go back and read any of the  12 studies that are cited that look at productivity  13 of union workers versus non-union workers?  14 A. Again, the question that you started  15 out as and I was answering is whether the  16 adjustment for age, education, race, and gender  17 are -- is there evidence that these are directly  18 linked to productivity. So that's -- I answered  19 that.  20 Q. I am off of that question now.  21 A. Okay. And then can you rephrase the  22 next question? Thank you or just restate --  23 Q. My question is is that when you read  24 this entire article that's included in your</p>	<p style="text-align: right;">Page 148</p> <p>1 up or did some manipulation that goes -- this  2 type of manipulation and lack of data on a  3 precise level makes these studies unreliable in  4 my opinion and I think in others, and this  5 general approach, you know, is not widely used  6 anymore.  7 Q. And it would be inappropriate to  8 impute from a larger data set the portion of that  9 data that is labor as opposed to materials,  10 correct? That's your criticism?  11 A. No, I am just saying this is an  12 example of that -- these studies do not really  13 have very well measured data, have to draw from  14 poor sources or either the quality of the sources  15 is not even mentioned or it is mentioned in  16 footnote 3. So in general that lack of quality,  17 reliable data and the general approach which is a  18 very restrictive approach, a very highly  19 restrictive empirical analysis is in my opinion  20 not credible and reliable evidence of  21 union-non-union wage differences, and that's why  22 I still say there's not credible direct -- I  23 shouldn't use the word credible -- reliable  24 direction evidence that unions are more or less</p>
<p style="text-align: right;">Page 147</p> <p>1 reference section and mentioned in footnote 2 of  2 your report and specifically the section on  3 productivity, did you go back and read any of the  4 articles on the topic of whether there were  5 productivity differences between union and  6 non-union workers?  7 A. No, I did not because again I do not  8 believe that this approach to measuring  9 productivity differences between union and  10 non-union productivity is a credible or reliable  11 approach.  12 Q. How do you know what the approach is?  13 A. Because it's the use of a production  14 function that uses aggregate data with poorly  15 measured variables. For example, in the '88  16 piece that's -- what number exhibit is this --  17 Exhibit 24. You can see that the price, for  18 example, on page 234 Mr. -- Dr. Allen states the  19 prices of capital and materials used in the cost  20 function analysis are imputed -- (reporter  21 clarification) -- cost function analysis are  22 imputed from other sources.  23 So the word imputed means that he --  24 another way of phrasing that could be he made it</p>	<p style="text-align: right;">Page 149</p> <p>1 productive than non-union labor.  2 Q. What is it do you think that was being  3 imputed that was inappropriate?  4 A. He imputed all of the main independent  5 variables. The prices of capital material, but  6 this is just an example. As you said, if you  7 want me to take ten minutes and be more precise  8 and read it a little more precisely.  9 Q. With respect to Exhibit 25, you told  10 me you had read that and --  11 A. Yes, but --  12 Q. -- I don't think it's appropriate for  13 you to go do homework during the deposition so  14 you can answer my questions better, but I think I  15 am ready to move off that except for one question  16 which is you think it's inappropriate where  17 Dr. Allen had to impute the cost of capital labor  18 and materials from different data?  19 A. I don't think it's inappropriate. It  20 is -- it reduces the credibility and reliability  21 of those types of studies in that context for  22 that application --  23 Q. Okay.  24 A. -- which is fundamentally different</p>

<p style="text-align: right;">Page 150</p> <p>1 from the analysis in my report.</p> <p>2 Q. Let me ask you a hypothetical. Under</p> <p>3 the approach that you are recommending to the</p> <p>4 court, if you have an electrician -- excuse me --</p> <p>5 let's use carpenter. If you have a carpenter who</p> <p>6 did \$10,000 -- strike that.</p> <p>7 If you had a carpenter where the</p> <p>8 amount of labor done by that carpenter cost</p> <p>9 \$10,000. Okay. And he was a union carpenter and</p> <p>10 he did that -- was able to do the work that cost</p> <p>11 \$10,000 in 100 hours. Actually, let's use 100</p> <p>12 hours. Okay. So that is \$100 per hour if I do</p> <p>13 my math right.</p> <p>14 A. Correct.</p> <p>15 Q. Okay. Under your approach in order to</p> <p>16 ascertain damages, you would take that \$10,000,</p> <p>17 take the 50 percent number in Column 3 and say</p> <p>18 that had that work been done by a non-union</p> <p>19 worker, it would have been done for \$5,000.</p> <p>20 Therefore, that tenant's damages are \$5,000.</p> <p>21 Is that how your approach is to be</p> <p>22 applied?</p> <p>23 A. Well, I am not quite sure why you use</p> <p>24 10,000 and 100 hours so, but I would -- the</p>	<p style="text-align: right;">Page 152</p> <p>1 it.</p> <p>2 If the carpenter's labor -- the</p> <p>3 charges for the carpenter's labor in my</p> <p>4 hypothetical was \$10,000. Under your damages</p> <p>5 model, what is the damage to the tenant? And if</p> <p>6 you want to use a calculator, I am sure somebody</p> <p>7 can give you one.</p> <p>8 A. It would be \$4,000 I think.</p> <p>9 MR. FOSTER: Here is a calculator. Use it.</p> <p>10 BY THE WITNESS:</p> <p>11 A. Right. So it would be 3,333.7.</p> <p>12 BY MR. SCHUTTE:</p> <p>13 Q. And how did you do that calculation</p> <p>14 based on Table 1? What's the formula?</p> <p>15 A. It's in footnote 9, and it tells you</p> <p>16 the formula. So it would be 10,000 divided by</p> <p>17 1.5 is equal to 6,666.67, and the cost was</p> <p>18 10,000 -- that's the cost of non-union labor, and</p> <p>19 the cost of union labor was \$10,000. So it would</p> <p>20 be that.</p> <p>21 Q. I am going to have to ask you because</p> <p>22 for my purposes and for the judge and the jury</p> <p>23 they need to understand what you are saying.</p> <p>24 The chart itself does not have that</p>
<p style="text-align: right;">Page 151</p> <p>1 approach that I described and applied would be I</p> <p>2 would take the cost of union labor and then</p> <p>3 divide it by the 1.5 which is 50 percent in the</p> <p>4 column Table 1 labeled Union Wage Premium</p> <p>5 Metropolitan Chicago for carpenters, and then</p> <p>6 that's how I would get the difference between the</p> <p>7 cost of union and non-union labor.</p> <p>8 Q. Okay. But so if the cost of the</p> <p>9 carpenter's labor in my hypothetical was \$10,000</p> <p>10 and if the 50 percent is the union wage premium</p> <p>11 in Column 3, if the judge was to apply your</p> <p>12 damages model to the hypothetical, the damages</p> <p>13 would be \$5,000?</p> <p>14 A. 10,000 divided by 1.5.</p> <p>15 Q. Which is what? Why is it divided by</p> <p>16 1.5?</p> <p>17 A. I think I explain that in footnote 9.</p> <p>18 As noted, the union wage premium is equal to the</p> <p>19 union cost divided by the non-union cost</p> <p>20 expressed as a percent, but for the purposes of</p> <p>21 footnote 9 explains exactly why it should be</p> <p>22 divided by 1.5.</p> <p>23 Q. I am going to have to come back to</p> <p>24 that because I am not following, but let's apply</p>	<p style="text-align: right;">Page 153</p> <p>1 1.5 number, does it?</p> <p>2 A. It has the .5, the 50 percent. So I</p> <p>3 think -- so this is exactly -- using the exact</p> <p>4 numbers that I just calculated, the non-union</p> <p>5 labor costs would be 6,666 and 67 cents, and that</p> <p>6 would be the non-union, and then the union costs</p> <p>7 would be 10,000. The difference is 3,333.33.</p> <p>8 That is 50 percent of the 6,666.67 non-union cost</p> <p>9 of labor. That's exactly the 50 percent number.</p> <p>10 Q. Right, but I am actually asking about</p> <p>11 the -- can you tell me what the formula is? What</p> <p>12 are the numbers plugged into the formula to get</p> <p>13 to the 6667.67?</p> <p>14 A. It would be 10,000 --</p> <p>15 Q. Yes.</p> <p>16 A. -- divided -- I just gave you the</p> <p>17 formula. It's the difference in union wages. So</p> <p>18 if you go back to the beginning of the document</p> <p>19 or -- and again in footnote 9 it repeats it. It</p> <p>20 says that the union wage premium is the percent</p> <p>21 of the non-union wage -- it's the difference in</p> <p>22 the cost of union versus non-union labor</p> <p>23 expressed as a percent of the non-union wage.</p> <p>24 So in this case the difference in cost</p>

<p style="text-align: right;">Page 154</p> <p>1 was -- it works out to be 3,333.34, and that's</p> <p>2 divided by the 6,667.67 cost of non-union labor.</p> <p>3 Okay. So that -- because that's the hypothesis</p> <p>4 you gave me that the cost of union labor was</p> <p>5 10,000. Then the cost of non-union labor given</p> <p>6 the 50 percent difference that's printed in that</p> <p>7 table would have to be 3,337 which is 50 percent</p> <p>8 of the non-union wage of 6,667.</p> <p>9 Q. But, again, I am asking you for the</p> <p>10 formula.</p> <p>11 MR. FOSTER: Objection, asked and answered.</p> <p>12 BY THE WITNESS:</p> <p>13 A. So the formula is the wage union minus</p> <p>14 the wage non-union, okay, divided by the wage</p> <p>15 non-union.</p> <p>16 BY MR. SCHUTTE:</p> <p>17 Q. Okay. And how can you fill in those</p> <p>18 numbers using Table 1?</p> <p>19 A. How did I get these numbers?</p> <p>20 Q. No, no, no, no. I am assuming for a</p> <p>21 moment that -- all I am asking --</p> <p>22 A. Yes.</p> <p>23 Q. -- and this is for Judge Harjani. I</p> <p>24 want the record to be clear as to exactly how in</p>	<p style="text-align: right;">Page 156</p> <p>1 cost of labor is 3,333.33 which is exactly 50</p> <p>2 percent of the 6,666.67. So algebra works, and</p> <p>3 that's the algebra, and I should have put maybe</p> <p>4 the explicit formula in there. I thought</p> <p>5 footnote 9 was -- covered the base.</p> <p>6 Q. Okay. I think it's more clear now.</p> <p>7 It's not that you should say that if the</p> <p>8 carpentry costs were \$10,000 by a union worker,</p> <p>9 the cost for a non-union worker -- (reporter</p> <p>10 clarification) -- \$10,000 for a union carpenter</p> <p>11 that using the 50 percent, it would be \$5,000 for</p> <p>12 a non-union carpenter. I am reading the table</p> <p>13 wrong if I say that?</p> <p>14 MR. FOSTER: Is that a question?</p> <p>15 MR. SCHUTTE: Yes.</p> <p>16 MR. FOSTER: It wasn't phrased as a form of</p> <p>17 a question.</p> <p>18 BY THE WITNESS:</p> <p>19 A. Can you rephrase the question for me?</p> <p>20 Thank you.</p> <p>21 BY MR. SCHUTTE:</p> <p>22 Q. Yes. You are not suggesting to the</p> <p>23 judge, are you, that if we know that the cost of</p> <p>24 a union carpenter to do work was -- in labor</p>
<p style="text-align: right;">Page 155</p> <p>1 a hypothetical situation where we would know for</p> <p>2 invoices or some evidence that a particular</p> <p>3 carpentry project cost \$10,000 in carpentry</p> <p>4 labor. If the judge or the jury was presented</p> <p>5 with that piece of evidence, walk us through the</p> <p>6 formula using Table 1 which is where you refer</p> <p>7 them to on how you get to what the damages are.</p> <p>8 So 10,000 is the carpentry cost at union. What</p> <p>9 do we do next?</p> <p>10 A. Right. So then you -- so the</p> <p>11 10,000 -- so you have one unknown variable.</p> <p>12 That's the cost of non-union labor.</p> <p>13 Q. Yes.</p> <p>14 A. So if you plug in the formula, it's</p> <p>15 the 10,000 minus the unknown, we will just call</p> <p>16 it X, divided by X equals .5. So then you can</p> <p>17 use that formula to solve for the X which is the</p> <p>18 non-union labor, and I just gave you the example</p> <p>19 using exactly your hypothesis.</p> <p>20 If we had 10,000 and we were using the</p> <p>21 50 percent figure in Table 1, that would --</p> <p>22 solving for the X would lead to \$6,666.67 and</p> <p>23 that would be -- and if you notice, that is --</p> <p>24 that the difference between union and non-union</p>	<p style="text-align: right;">Page 157</p> <p>1 alone was \$10,000, that you can't then just apply</p> <p>2 the Table 1 Column 3 50 percent and say that</p> <p>3 means that the non-union carpenter would have</p> <p>4 cost \$5,000?</p> <p>5 A. That's correct.</p> <p>6 Q. Okay. And that the formula that you</p> <p>7 expect us to discern from your report is you</p> <p>8 think set out in footnote 9?</p> <p>9 A. I think it's set out in Section 3</p> <p>10 generally that approach is the general approach,</p> <p>11 yes.</p> <p>12 Q. Okay. Have you considered or looked</p> <p>13 into at all the process by which either a general</p> <p>14 contractor or a subcontractor puts together a bid</p> <p>15 for work for a renovation project in the Chicago</p> <p>16 Loop?</p> <p>17 A. No.</p> <p>18 Q. Would you agree with me that it is</p> <p>19 possible that a contractor who is bidding out a</p> <p>20 project in the Chicago Loop will make assumptions</p> <p>21 about his worker or her worker, whether union or</p> <p>22 non-union, and how many the hours the worker will</p> <p>23 have to put in to do the work that's necessary?</p> <p>24 A. I have no expertise or basis to</p>



<p style="text-align: right;">Page 158</p> <p>1 respond to that question.</p> <p>2 Q. Okay. So if a general contractor who</p> <p>3 is calculating a bid would say that I have a</p> <p>4 union carpenter who I think can do the work that</p> <p>5 needs to be done for \$10,000 and it will take</p> <p>6 him -- let me make an easier example.</p> <p>7 If I am a contractor and I say that I</p> <p>8 have a union carpenter and based on my experience</p> <p>9 it will take him 10 hours at \$100 per hour to do</p> <p>10 the project, okay. So it's \$1,000 total. Would</p> <p>11 you agree with me that it's possible that the</p> <p>12 non-union contractor would say to himself that my</p> <p>13 carpenter is going to take 20 hours to do the</p> <p>14 project at \$50 an hour for \$1,000 for the entire</p> <p>15 project?</p> <p>16 A. I have no idea what the contractors</p> <p>17 will assume.</p> <p>18 Q. Okay. If all we have to measure</p> <p>19 damages on behalf of tenants who have done</p> <p>20 projects -- renovation projects in the Chicago</p> <p>21 Loop are what they were charged without any</p> <p>22 breakdown of how many hours it took at what rate,</p> <p>23 it's not possible to actually identify what is</p> <p>24 union versus non-union as opposed to efficiency</p>	<p style="text-align: right;">Page 160</p> <p>1 that -- as it says differences in the cost of</p> <p>2 union and non-union labor.</p> <p>3 Q. Okay. And so in order for us to use</p> <p>4 your approach, we need to be able to identify the</p> <p>5 labor component of work done in a renovation</p> <p>6 project in the Chicago Loop?</p> <p>7 A. Correct.</p> <p>8 Q. Okay. It would be inappropriate to</p> <p>9 apply your formula to a profit that a contractor</p> <p>10 builds into a bid for a renovation project in the</p> <p>11 Chicago Loop, correct?</p> <p>12 A. I am going to stick with what I wrote</p> <p>13 and what I believe is it would be ideal to have</p> <p>14 the labor costs, purely the labor costs. In the</p> <p>15 absence of that, there would have to be some</p> <p>16 estimate.</p> <p>17 Q. Okay. But your report doesn't say in</p> <p>18 the absence of that, there will be some estimate.</p> <p>19 You have written for each class member, the cost</p> <p>20 incurred for union services will be available.</p> <p>21 What's the basis of that statement?</p> <p>22 A. Again, it's that the costs are</p> <p>23 available. Whether they are directly available</p> <p>24 as a pure labor cost is the question that I think</p>
<p style="text-align: right;">Page 159</p> <p>1 and productivity. Agree with that?</p> <p>2 A. No, I really don't understand exactly</p> <p>3 what question you would like me to answer. So</p> <p>4 please try to -- if you can help me.</p> <p>5 Q. Yeah. How much a contractor will bid</p> <p>6 out a piece of work depends on what the</p> <p>7 contractor has to put it in materials, what --</p> <p>8 how much time at a certain wage the worker will</p> <p>9 take, and what level of profit he or she wants to</p> <p>10 obtain.</p> <p>11 Would you agree with that?</p> <p>12 A. I don't know why -- I have no basis of</p> <p>13 opinion to agree or disagree. I don't know what</p> <p>14 contractors do in their bidding. I really don't</p> <p>15 so --</p> <p>16 Q. Okay. That's fair.</p> <p>17 A. -- I apologize.</p> <p>18 Q. No, that's fair.</p> <p>19 Your formula on page 9 of your report</p> <p>20 should only be applied, correct, to the labor</p> <p>21 component of projects that are done in</p> <p>22 renovation. For example, it should not apply to</p> <p>23 material?</p> <p>24 A. I think that is correct. It says</p>	<p style="text-align: right;">Page 161</p> <p>1 you are asking, and so this approach ideally</p> <p>2 applies to pure labor costs but can be applied</p> <p>3 generally just like in any context where you have</p> <p>4 to estimate some -- another part of the problem,</p> <p>5 but ideally it would be to pure labor costs.</p> <p>6 Q. But your formula does not -- your</p> <p>7 framework doesn't have any reference, does it, to</p> <p>8 estimating. Your analysis says that the cost</p> <p>9 incurred for union services will be available.</p> <p>10 So you are assuming that that data</p> <p>11 point is available for every single project for</p> <p>12 every single tenant in the Chicago Loop during</p> <p>13 the class period, right?</p> <p>14 MR. FOSTER: Excuse me. Where are you</p> <p>15 quoting from?</p> <p>16 MR. SCHUTTE: Bullet one on page 9.</p> <p>17 BY THE WITNESS:</p> <p>18 A. I mean that's certainly a literal</p> <p>19 reading of the bullet point.</p> <p>20 MR. SCHUTTE: Okay. This will be 26.</p> <p>21 (WHEREUPON, a certain document</p> <p>22 was marked Deposition Exhibit No.</p> <p>23 26, for identification, as of</p> <p>24 2/21/20.)</p>



<p style="text-align: right;">Page 162</p> <p>1 MR. SCHUTTE: Andrea, this will be 27, 2 please. 3 (WHEREUPON, a certain document 4 was marked Deposition Exhibit No. 5 27, for identification, as of 6 2/21/20.) 7 BY MR. SCHUTTE: 8 Q. We have marked as Exhibit 26 WDES's 9 Supplemental Response to Interrogatory No. 4, and 10 we have marked as Exhibit No. 27 a document Bates 11 labels WDES 41 which is a document referred to in 12 Supplemental Response to Interrogatory No. 4, and 13 you have never seen either of those documents 14 before, have you? 15 A. I may have seen the response to the 16 interrogatory or -- they weren't used in my 17 report. 18 Q. Okay. All right. But let's take a 19 look at page 5 of Exhibit 26, and the 2014 20 renovation project the answer in the supplemental 21 response was: The subject of Plaintiff -- that's 22 WDES's claim with respect to its 2014 Tenant 23 Improvement Allowance contracting costs is 24 \$232,104 which includes, and then there are</p>	<p style="text-align: right;">Page 164</p> <p>1 for the work done by each of those vendors, 2 correct? 3 A. You'd have to have a -- to know the 4 labor costs -- 5 Q. Yes. 6 A. -- or to be able to estimate them? 7 Yes. 8 Q. Your analysis does not talk about 9 estimating? 10 A. My analysis says that the costs will 11 be available. It doesn't say how they will be 12 available. Whether they were estimated or a line 13 item directly. 14 Q. Or imputed? Would it be appropriate 15 to impute them? Is that credible? 16 A. I do not understand what you mean by 17 impute. 18 Q. Impute I used it in the same way that 19 you used earlier that it wasn't appropriate for 20 Dr. Allen to impute information from information 21 that wasn't available. 22 A. I didn't say it wasn't appropriate. I 23 said it is unknown the reliability and 24 credibility and precision and the adequacy of</p>
<p style="text-align: right;">Page 163</p> <p>1 several bullets broken down. 2 And then it goes on to say at the very 3 bottom of the paragraph under those bullets that 4 the amount of damages will be determined by 5 applying the methodology provided by Dr. Robert 6 Kaestner in his previously-produced report to 7 each of these categories listed in the 8 supplemental response. 9 Do you see that? 10 A. I do. 11 Q. Okay. And then the document we have 12 marked as Exhibit 27 WDES 41 is a document that 13 is referenced in the response that has the 14 numbers that correspond to the bullets. 15 Do you see that? 16 A. Yes. 17 Q. Okay. So this is a real world issue 18 for the judge and the jury. If we are going to 19 apply your analysis as the plaintiff says we 20 should to calculate the damages that WDES 21 allegedly suffered because of the union premium, 22 for each of those bullets we would have to know 23 the portion of the costs or perhaps it's all, but 24 we would need to know what the labor costs are</p>	<p style="text-align: right;">Page 165</p> <p>1 that -- the comment, the footnote, the imputation 2 which is very common in general in those studies. 3 It's usually known that it's very imprecise, and 4 so, for example, all the estimates that are 5 presented by Dr. Allen, he doesn't -- I don't 6 think he puts very much confidence intervals, but 7 whether those confidence intervals are even valid 8 given all the constructed and imputed data would 9 be a serious question, and, again, this is why 10 that -- those types of studies are not that 11 reliable. 12 So my report says that they will be 13 available, and how they will be available I don't 14 know. They could be available directly or 15 through an estimate. 16 Q. So is it your testimony under oath to 17 the judge that when you wrote in your report at 18 page 9 that the cost incurred for union services 19 will be available, that we are supposed to read 20 that as either available or that can be 21 estimated? 22 A. I think that they would be available 23 or can be estimated would be more in line with my 24 intention.</p>

<p style="text-align: right;">Page 166</p> <p>1 Q. Okay. But you didn't write or can be 2 estimated. You stopped at will be available, 3 correct? 4 A. Correct. 5 Q. Okay. Do you have in your expert 6 opinion a formula that on a class-wide basis that 7 the amount -- the cost incurred for union 8 services can be estimated based on an overall 9 invoice from a vendor? 10 A. What would you like me to answer? I'm 11 sorry. Again, can you just restate it? 12 Q. Yeah. I am asking whether you have 13 offered any opinion about how -- when the cost 14 incurred for union services is not directly 15 available, are you offering an opinion as to how 16 the cost of union services could be estimated 17 based on an invoice that would include labor 18 cost, material, and profit? 19 A. I have not done so in my report. 20 Q. The entry for -- in the interrogatory 21 response Exhibit No. 26, the last -- second to 22 last bullet is \$24,877 for general contracting 23 fees by Ostrander Construction. 24 Do you see that?</p>	<p style="text-align: right;">Page 168</p> <p>1 that if we apply your formula, that we can 2 calculate -- we can estimate the damages for each 3 potential class member? 4 A. I am saying that. 5 Q. Okay. So what I am doing is giving 6 you as an exemplar the class representative WDES 7 and what they have told us about their damages 8 case. 9 So your formula -- if the 24,877 for 10 general contracting fees, my first question is if 11 that's the evidence presented to the court, which 12 occupational group in Table 1 would we use? 13 A. Is that a hypothetical or is this 14 actual? So I don't want to answer on a 15 hypothetical question. I don't know how it 16 relates to my inability to -- how it overturns or 17 disturbs the general approach that I would use. 18 There's nothing in that document that is -- that 19 overturns the general nature of my approach. Now 20 so that's one answer. 21 Q. Do you understand that the reason your 22 general approach is being offered is that 23 plaintiff's counsel has told the judge that you 24 can take your general approach and apply it to</p>
<p style="text-align: right;">Page 167</p> <p>1 A. I do. 2 Q. If that was all -- well, first of all, 3 if that's the -- again, I am testing here the 4 ability of your analysis to be applied on a 5 class-wide basis. 6 What occupational group would you 7 apply from Table 1 for general contracting fees? 8 A. First, I would like to say that I 9 stand by my report that the general approach is 10 valid and that it can be moved forward. So 11 that's -- 12 Q. By the way, I am not -- 13 A. No, no, I know, but I am just saying. 14 So that's what I made my basis on. So I am not 15 sure why I am answering the question, and please 16 just clarify for me why I am answering the 17 question -- 18 Q. I am happy to do that. I will read to 19 you your first sentence on page 9: "Damages for 20 each potential class member can be estimated 21 using the evidence on the differences in the cost 22 of union and non-union labor presented in Table 23 1." 24 So are you not telling the judge there</p>	<p style="text-align: right;">Page 169</p> <p>1 every class member without regard to individual 2 issues and reach damages calculations, as you 3 say, damages for each potential class member can 4 be estimated using the evidence on the 5 differences in the cost of union and non-union 6 labor presented in Table 1. This is not a 7 hypothetical. 8 MR. FOSTER: Wait, I object to the form of 9 your question. You are putting in stuff about 10 individual issues which he didn't say in his 11 report. He doesn't use that phrase. So okay. 12 If you want to ask him about what he said in his 13 report, that's fine, but I don't think you should 14 misstate what he said in his report. 15 BY MR. SCHUTTE: 16 Q. That's fair enough. My question is 17 this: Your general report on page 9 I want you 18 to apply it to the real world damages line item 19 for WDES of \$24,000 -- \$24,877 for general 20 contracting fees by Ostrander Construction. 21 First, on Table 1 what occupational group would 22 we look to for the union premium? 23 MR. FOSTER: I object to the form of the 24 question. You can answer if you understand.</p>

<p style="text-align: right;">Page 170</p> <p>1 BY THE WITNESS:</p> <p>2 A. The short answer is it doesn't map</p> <p>3 over to the occupations in Table 1.</p> <p>4 BY MR. SCHUTTE:</p> <p>5 Q. So some judgment would have to be</p> <p>6 applied by whoever is applying the formula?</p> <p>7 A. Yes.</p> <p>8 Q. Okay. If that \$24,877 included the</p> <p>9 cost of renting dumpsters, the amount of the</p> <p>10 dumpsters would have to be backed out of that</p> <p>11 \$24,877 before you apply your union wage premium,</p> <p>12 correct?</p> <p>13 MR. FOSTER: I object to the form of the</p> <p>14 question. You can answer.</p> <p>15 BY THE WITNESS:</p> <p>16 A. So we can go down this line several</p> <p>17 times if you would like. So my report says the</p> <p>18 information will be available. I have testified</p> <p>19 that when I said that, I believe it's either</p> <p>20 directly available or would be estimated. Given</p> <p>21 that, I would apply the general approach and the</p> <p>22 estimates in Table 1, and so that's how I would</p> <p>23 answer the question.</p> <p>24</p>	<p style="text-align: right;">Page 172</p> <p>1 dumpsters?</p> <p>2 MR. FOSTER: Object to the form of the</p> <p>3 question, asked and answered. You can answer.</p> <p>4 BY THE WITNESS:</p> <p>5 A. In this case you would have a very</p> <p>6 reliable estimate of \$800. So that would be a</p> <p>7 very good estimate that would make it available.</p> <p>8 BY MR. SCHUTTE:</p> <p>9 Q. And you agree with me we would have to</p> <p>10 back that out?</p> <p>11 A. That's what we mean -- that's what I</p> <p>12 mean by estimate.</p> <p>13 Q. Okay. If that 24,877 included \$13,048</p> <p>14 in insurance premiums, you would agree with me if</p> <p>15 that evidence was available, that \$13,048 would</p> <p>16 you to have backed out of the 24,877, correct?</p> <p>17 A. I am just going to answer in general,</p> <p>18 and it applies specifically to your question that</p> <p>19 the general approach applies to labor costs.</p> <p>20 Labor costs would have to be available either</p> <p>21 directly or estimated. You are using the word</p> <p>22 back out as a -- in my language it would be</p> <p>23 estimate. So that would apply to the last two</p> <p>24 examples.</p>
<p style="text-align: right;">Page 171</p> <p>1 BY MR. SCHUTTE:</p> <p>2 Q. But I have a very specific question</p> <p>3 which is if that \$24,877 includes the cost of</p> <p>4 renting dumpsters before you apply your formula,</p> <p>5 we would have to back out the cost of renting the</p> <p>6 dumpsters because those are not labor costs,</p> <p>7 right?</p> <p>8 If it's a known number, we would have</p> <p>9 to back that out before we can apply your formula</p> <p>10 because your formula only applies to labor costs?</p> <p>11 MR. FOSTER: I object to the form of the</p> <p>12 question. You can answer.</p> <p>13 BY THE WITNESS:</p> <p>14 A. I have already stated that if it's not</p> <p>15 directly available, it would have to be</p> <p>16 estimated.</p> <p>17 BY MR. SCHUTTE:</p> <p>18 Q. I'm not asking about estimating. I am</p> <p>19 telling you that I am telling you specifically</p> <p>20 that if the evidence was that that \$24,877</p> <p>21 included \$800 in dumpster rental to apply your</p> <p>22 formula, he would have to take the \$800 out</p> <p>23 because the union wage premium does not</p> <p>24 contemplate a union premium for renting</p>	<p style="text-align: right;">Page 173</p> <p>1 Q. But you have not provided the court</p> <p>2 with any way to on a class-wide basis estimate</p> <p>3 labor costs when the information available</p> <p>4 aggregates -- aggregates labor cost, material,</p> <p>5 and profit, correct?</p> <p>6 A. That's correct.</p> <p>7 Q. Okay. Let's turn to the section in</p> <p>8 your report on use of the Illinois Department of</p> <p>9 Labor data. Now, at the end of the day, you do</p> <p>10 this analysis and it's summarized in Table 2. I</p> <p>11 think I covered this earlier just to make sure</p> <p>12 the record is clear. You are not recommending to</p> <p>13 the judge that Table 2 be used in the class-wide</p> <p>14 damages calculation?</p> <p>15 A. That's correct.</p> <p>16 Q. Okay. Why did you include the</p> <p>17 Illinois Department of Labor analysis if it's not</p> <p>18 going to be something that you are recommending</p> <p>19 to the judge to be applied?</p> <p>20 A. I included it to show the</p> <p>21 reasonableness and the credibility of what I have</p> <p>22 referred to and you have referred to as my</p> <p>23 original analysis.</p> <p>24 Q. Okay.</p>

<p style="text-align: right;">Page 174</p> <p>1 A. And these data have some advantages or 2 some usefulness is a better word relative to 3 the -- for that purpose. 4 Q. So if I understand what you did here, 5 is you took information available from the 6 Illinois Department of Labor in the form of 7 prevailing wages for various occupations in Cook 8 County? 9 A. I took all the occupations that are 10 published by the Illinois Department of Labor as 11 prevailing wages in Cook County that map into the 12 occupations in Appendix A. 13 Q. Okay. You write at page 6 that: "The 14 IDOL prevailing wage is the wage plus fringe 15 benefit paid to construction workers on public 16 works jobs." 17 What's the citation or the factual 18 backup for that statement? 19 A. The Illinois statute, the prevailing 20 wage statute of Illinois. 21 Q. So here you are only looking at public 22 works jobs. You are not looking at work done on 23 private construction projects, correct? 24 A. So the prevailing wage is applied to</p>	<p style="text-align: right;">Page 176</p> <p>1 Q. The -- you write in page 6: "Almost 2 all such workers are unionized." 3 What percentage are not unitized? 4 A. I don't know the exact percentage, but 5 again from my reading of the methodology and from 6 other sources that have discussed prevailing 7 wages, it's widely accepted I think and 8 documented that the prevailing wage is -- is 9 very -- is a measure of the union wage. 10 Q. What other sources are you referring 11 to? 12 A. Other documents that I read, you know, 13 briefly but aren't cited, no. 14 Q. They are not cited in the report -- 15 A. No, so let's rely on just -- rely on 16 the Illinois -- I relied mostly on the Illinois 17 Department of Labor methodology and the 18 description of their survey. 19 Q. Okay. And you come to the conclusion 20 that the Illinois Department of Labor prevailing 21 wage is an accurate estimate of the wage and 22 fringe benefit cost of union workers in 23 construction occupations in Cook County, correct? 24 A. Correct.</p>
<p style="text-align: right;">Page 175</p> <p>1 public works jobs. The prevailing wage itself 2 probably includes information from non-public 3 works jobs as -- right. So the statute says that 4 for public works jobs, you have to pay this 5 prevailing wage. The prevailing wage is obtained 6 from surveys of unions, for example, of what they 7 paid their workers on jobs. I presume they are 8 public work jobs. 9 Q. You presume? 10 A. As best I can tell from the Illinois 11 Department of Labor methodology that is cited in 12 the report. 13 Q. Are there non-union wages that are 14 reported and used in calculating the Cook County 15 prevailing wage? 16 A. There may be, but I think again 17 reading the methodology provided by the Illinois 18 Department of Labor, that they're mainly union 19 reported. That the unions report the wages 20 directly to the -- to the state. 21 Q. Okay. So where would I go to validate 22 that statement? 23 A. Again, it's -- the footnote 7 gives 24 you the citation.</p>	<p style="text-align: right;">Page 177</p> <p>1 Q. Okay. Then you compare that, do you 2 not, against non-union wages outside of the 3 Chicago metropolitan area as adjusted by 4 calculating a fringe benefit cost? 5 A. I do and the reason I do that is 6 because of the previously cited evidence that the 7 non-union wages in the metropolitan Chicago area 8 do not differ significantly or meaningfully in an 9 economic sense as we discussed from the non-union 10 wages in these occupations from the country as a 11 whole. So that's a reasonable and credible 12 estimate of the non-union wage. 13 Q. But on the analysis you did using the 14 current population survey, you were comparing 15 data from that data set on the union side and the 16 non-union side. In Section 3 you are using the 17 Illinois Department of Labor prevailing wage plus 18 fringe benefits on one side, and you are using 19 CPS nationwide data adjusted for fringe benefits 20 on the other for the comparison, correct? 21 A. That's correct, and the reason I did 22 that is, again, because of the evidence that the 23 non-union wage in the Chicago metropolitan area 24 does not differ significantly or meaningfully</p>

<p style="text-align: right;">Page 178</p> <p>1 from the non-union wage in the U.S. as a whole in 2 these occupations. 3 Q. All right. And the results of your 4 analysis are set out in Table 2 on page 7, 5 correct? 6 A. Correct. 7 Q. And that's shown as a prevailing 8 wage -- all the numbers shown there other than 9 the percentages are dollars per hour? 10 A. Yes. 11 Q. Okay. This morning you told me that 12 there's a portion of your analysis that relies on 13 not per hour but per week. 14 Where -- what part of your analysis or 15 the data you looked at was data based on wage per 16 week? 17 A. So Table 1 of the sample used in Table 18 1 contains self-reported wages by workers covered 19 and not covered by unions. Some report the wages 20 in hourly wage. Some report it as a weekly wage. 21 In my analysis I actually adjusted for that 22 because there may have been differences between 23 reporting by union and non-union workers. So I 24 wanted to take out any of those differences, and</p>	<p style="text-align: right;">Page 180</p> <p>1 column labeled Non-Union Hourly Wage, that's the 2 estimates that I have obtained. 3 Q. I see. The idea of the Department of 4 Labor Cook County prevailing wage is really just 5 a reference to numbers on the website that's 6 cited? 7 A. Correct. 8 Q. Thank you. 9 Why did you include fringe benefits in 10 the Department of Labor prevailing wage analysis 11 but not in the CPS data analysis? 12 A. Because in the prevailing -- in this 13 section -- what section -- we are just going to 14 refer to it as the Illinois Department of Labor 15 section. The prevailing wage includes wages and 16 fringe benefits. So I wanted to compare apples 17 to apples, and the Current Population Survey only 18 reports the -- what's referred to as straight 19 time wages or just the wage component of 20 compensation, not fringe benefits. 21 Q. Do you have any understanding as to 22 whether when a contractor is doing a renovation 23 project in the Chicago Loop it's the type of work 24 that would be covered by the class here, whether</p>
<p style="text-align: right;">Page 179</p> <p>1 I did so and so. 2 Q. Okay. When the data is reported as 3 hours -- or excuse me -- wages per week, what is 4 the assumption made about how many hours were 5 worked per week? 6 A. So I didn't make any assumption, and 7 that's very much importantly why I adjusted for 8 whether the reporting was done by the hour or the 9 week and because if there was significant 10 differences, then that might have been reflected 11 in differences in hours worked. In fact, there 12 were no -- that's been adjusted. So that's not 13 an issue in that these numbers. 14 Q. And all of that analysis is reflected 15 in your Stata data? 16 A. In the Stata data code, yes. 17 Q. Yes. Is all of the data manipulation 18 analysis that you did -- I will take away the 19 manipulation. I didn't mean it to be a negative 20 term, but is all the statistical work you did 21 with respect to the Department of Labor 22 prevailing wage also reflected in your Stata 23 data? 24 A. Not all of it, but it's a -- the</p>	<p style="text-align: right;">Page 181</p> <p>1 that contractor passes along to the tenant the 2 fringe benefit costs of employees? 3 A. I have no direct knowledge, but that 4 would be certainly part of labor costs. So my 5 full expectation would be that that would be part 6 of the wage bill. 7 Q. You told me that you included Table 2 8 in the entire Illinois Department of Labor 9 analysis because -- you know, the record will say 10 what it says -- but I understood you to say that 11 it sort of provides perspective or justifies the 12 Table 1 analysis? 13 A. It provides evidence supportive of 14 Table 1 same as the academic -- review of 15 academic literature. It's showing a 16 preponderance of evidence, a constellation of 17 evidence that's all consolidating and coming to 18 a -- you know, showing more or less the same 19 thing. So it's in my mind a very powerful way to 20 demonstrate the difference between union and 21 non-union wages. 22 Q. Okay. Is there any -- do you think 23 that Table 1 is more accurate than Table 2 in 24 measuring non-union versus union wages?</p>



<p style="text-align: right;">Page 182</p> <p>1 A. I think they measure different things.  2 So Table 1 measures just the -- let's just refer  3 to it as the union wage premium, the difference  4 in union and non-union wages based on wages.  5 It's a large sample of persons. So it's quite  6 accurate in terms of the precision, the certainty  7 of the estimates.  8 So and that's why -- and it covers  9 more of the occupations. So that would be why I  10 would prefer it to -- in terms of if we had to  11 use -- if I had to use one number to report,  12 those estimates would be probably -- because they  13 are more comprehensive and larger samples.  14 Q. Okay. On page 6 you write: It is  15 well known -- this is in the first paragraph  16 under little (indicating). "It is well known  17 that the prevailing wage published by the  18 Illinois Department of Labor is the union wage  19 and not the competitive (non-union) market wage  20 which is sometimes referred to as the prevailing  21 wage."  22 What is the source of your statement  23 that that is well known?  24 MR. FOSTER: Well, wait. Objection, that</p>	<p style="text-align: right;">Page 184</p> <p>1 known that the prevailing wage published by the  2 Illinois Department of Labor is the union wage  3 and not the competitive (non-union) market wage."  4 What is the source of that statement  5 that it's well known. That it's the union wage  6 and not the market wage?  7 A. Again, it's my -- it's with reference  8 to the methodology that's published by the  9 Illinois Department of Labor and my expert  10 opinion on this.  11 Q. It's actually a combination of even  12 under your own report mostly union but some  13 non-union wages?  14 A. I don't know what mostly. It has --  15 it has some -- it can some non-union wages in  16 there.  17 Q. Okay. I used my word. I will use  18 your word. Almost all of the wages that are in  19 the calculation of the Department of Labor  20 prevailing wage are union but some are not,  21 correct?  22 A. That's what I have written, and that's  23 based on the methodology of the Illinois  24 Department of Labor.</p>
<p style="text-align: right;">Page 183</p> <p>1 was asked and answered. Okay. You can answer.  2 BY THE WITNESS:  3 A. The prevailing wage -- sometimes the  4 market wage is referred to as the prevailing wage  5 in -- even in academic literature, but in the  6 context of what the Illinois Department of Labor  7 and the Illinois statute, it's called the  8 prevailing wage statute. It follows from the  9 federal statute. That's a very specific meaning  10 of the term, and that refers to wages plus fringe  11 benefits.  12 So there's and important distinction  13 that I didn't want to have confused and conflated  14 that the prevailing wage as reported by the  15 Illinois Department of Labor is part of the  16 Illinois prevailing wage statute is -- it  17 mandates to include wages and fringe benefits  18 where if I was talking to colleagues and we would  19 say the prevailing wage in the Chicago market, we  20 would be probably referring to the market wage,  21 the competitive market wage without restraint of  22 supply for example by unions.  23 Q. But the sentence I read to you is not  24 about fringe benefits. It says: "It is well</p>	<p style="text-align: right;">Page 185</p> <p>1 MR. FOSTER: Would you mind taking a short  2 break?  3 MR. SCHUTTE: No, not at all. Actually --  4 MR. FOSTER: Are we getting towards the end?  5 MR. SCHUTTE: I wouldn't say getting towards  6 the end. If you give me ten minutes, I can  7 probably organize things and based on how things  8 have just gone probably short-circuit. So give  9 me ten --  10 MR. FOSTER: Ten minutes.  11 MR. SCHUTTE: -- actually, why don't we do  12 this. If it's quicker than ten minutes --  13 MR. FOSTER: Just come let us know, okay,  14 but you got it. All right.  15 THE VIDEOGRAPHER: Going off the video  16 record at 2:41 p.m.  17 (WHEREUPON, a recess was had at  18 2:41 p.m. until 2:54 p.m.)  19 THE VIDEOGRAPHER: We are back on the video  20 record at 2:54 p.m. You may proceed.  21 BY MR. SCHUTTE:  22 Q. Dr. Kaestner, the analysis you did  23 looking at the Illinois Department of Labor  24 numbers, that is not specific to the Chicago</p>

<p style="text-align: right;">Page 186</p> <p>1 Loop, correct? It's specific to Cook County?</p> <p>2 A. Correct.</p> <p>3 Q. Okay. I want to go back and close the</p> <p>4 Loop on the hypothetical that I started when we</p> <p>5 got derailed from, and I want you to make the</p> <p>6 following assumption that you have a carpenter</p> <p>7 who takes 100 hours to do a project at \$100 per</p> <p>8 hour such that the total project cost is \$10,000.</p> <p>9 That's a union carpenter. I want you to assume</p> <p>10 that a non-union carpenter to do the same project</p> <p>11 will take 200 hours at \$50 an hour. So also a</p> <p>12 \$10,000 project.</p> <p>13 There's nothing in the analysis you</p> <p>14 are proposing that would account for the</p> <p>15 possibility that a difference between union and</p> <p>16 non-union work is reflective of the fact that</p> <p>17 union workers can be more efficient and</p> <p>18 productive than non-union workers, correct, in</p> <p>19 that scenario?</p> <p>20 A. No, that's -- I don't know if it's</p> <p>21 correct or not, but I am going to explain what's</p> <p>22 pertinent in my report, and that's the point</p> <p>23 about adjusting for age and education. They are</p> <p>24 sometimes viewed as proxy variables without</p>	<p style="text-align: right;">Page 188</p> <p>1 scientific inquiry, we talk about scientific</p> <p>2 plausibility. Should we even be looking at</p> <p>3 this -- for this research question.</p> <p>4 So you have presented a hypothetical</p> <p>5 question that I would suggest might not have any</p> <p>6 scientific plausibility because it's not much</p> <p>7 evidence of these stark differences in</p> <p>8 productivity that you have laid out. Conditional</p> <p>9 on that, anything is possible. So that would be</p> <p>10 your hypothetical -- the math in your</p> <p>11 hypothetical example is correct under the</p> <p>12 conditions you stated.</p> <p>13 BY MR. SCHUTTE:</p> <p>14 Q. How many years have you been teaching?</p> <p>15 A. Too long, too many. About 30.</p> <p>16 Q. Okay. Do you think that you can</p> <p>17 prepare for class more efficiently and</p> <p>18 productively than a professor who is just in his</p> <p>19 or her first year of teaching?</p> <p>20 Both of you have Ph.D.s, both of you</p> <p>21 are -- you're probably going to be older, both of</p> <p>22 you are white men, both of you Ph.D.s, would you</p> <p>23 agree with me that as somebody who has been</p> <p>24 teaching for 30 years you can prepare for class</p>
<p style="text-align: right;">Page 187</p> <p>1 direct measurement but as proxy variables for</p> <p>2 productivity differences. So I adjust for them</p> <p>3 and present estimates even after adjusting for</p> <p>4 them. So in some sense my analysis does account</p> <p>5 for that possibility and the estimates are</p> <p>6 presented.</p> <p>7 Q. But in my hypothetical I want you to</p> <p>8 assume that each carpenter is the same race, the</p> <p>9 same age, the same sex, and has the same</p> <p>10 education level. Your formula would not be able</p> <p>11 to account for the fact that it's possible that</p> <p>12 the union worker can do more in a shorter period</p> <p>13 of time, albeit at a higher per hour wage, than a</p> <p>14 non-union worker?</p> <p>15 MR. FOSTER: Okay. One second. I just want</p> <p>16 to object to the form of the question,</p> <p>17 speculation. You can answer.</p> <p>18 BY THE WITNESS:</p> <p>19 A. Again, I would quibble with the</p> <p>20 scenario that there is in -- some possibility or</p> <p>21 some evidence, some scientific plausibility that</p> <p>22 we would have that type of disparity in</p> <p>23 productivity between union and non-union wages.</p> <p>24 So when I -- when we go and take -- undertake a</p>	<p style="text-align: right;">Page 189</p> <p>1 more efficiently than a person who is teaching</p> <p>2 their first class?</p> <p>3 A. Again, you know, I don't know that</p> <p>4 this is true. That like, for example, I don't</p> <p>5 think my teaching evaluations would be an</p> <p>6 assessment of my productivity are better than the</p> <p>7 teaching evaluations of a new assistant</p> <p>8 professor, and so similarly in terms of research,</p> <p>9 new assistant professors publish research, and I</p> <p>10 publish research so but --</p> <p>11 Q. I understand that you disagree with</p> <p>12 the premise that union workers can be more</p> <p>13 productive than non-union workers, but whether</p> <p>14 that's true or not, your analysis, your formula</p> <p>15 does not take that into account, correct?</p> <p>16 A. Again, I don't disagree or agree. I</p> <p>17 think there's no evidence that I think is</p> <p>18 credible that identifies that there are</p> <p>19 significant productivity differences between</p> <p>20 union and non-union workers in construction or</p> <p>21 more broadly, but I don't think the evidence is</p> <p>22 there. So based on that, then I don't think that</p> <p>23 I would expect there to be large productivity</p> <p>24 differences that explain the differences in</p>

<p style="text-align: right;">Page 190</p> <p>1 wages --</p> <p>2 Q. Okay.</p> <p>3 A. -- and then finally the adjustment for</p> <p>4 age, education, race, and gender are less</p> <p>5 important, but age and education are intended to</p> <p>6 address this issue, and they don't make much of a</p> <p>7 difference consistent with the lack of evidence.</p> <p>8 Q. But you told me you couldn't point me</p> <p>9 to a single article that tied age, education,</p> <p>10 race, or gender to productivity in the</p> <p>11 construction industry?</p> <p>12 MR. FOSTER: Objection, asked and answered.</p> <p>13 BY THE WITNESS:</p> <p>14 A. But directly, yes.</p> <p>15 BY MR. SCHUTTE:</p> <p>16 Q. Okay. Again, I think we -- I</p> <p>17 recognize you disagree with the premise, but if</p> <p>18 there were differences in productivity between</p> <p>19 union and non-union workers, that would not be</p> <p>20 picked up for in your framework?</p> <p>21 A. Again, I think your math is correct,</p> <p>22 and to the extent that that would be different</p> <p>23 than my framework, yes.</p> <p>24 Q. Okay. You -- in your report on that</p>	<p style="text-align: right;">Page 192</p> <p>1 done -- many renovation jobs done in the Chicago</p> <p>2 Loop that the only thing available to a tenant</p> <p>3 would be the overall cost of all work by all</p> <p>4 occupational groups and materials and profit as a</p> <p>5 single number?</p> <p>6 A. I have no knowledge of this.</p> <p>7 Q. Okay. You told me that you put in a</p> <p>8 total of 15 hours, obviously more since that</p> <p>9 after going through today.</p> <p>10 Of that 15 hours, what percentage of</p> <p>11 time did you spend actually writing the report</p> <p>12 versus reviewing the articles, manipulating the</p> <p>13 data, or looking at the First Amended Complaint</p> <p>14 and the interrogatory responses?</p> <p>15 A. You know, five.</p> <p>16 Q. Five hours writing the report?</p> <p>17 A. Of, you know, those are billed hours</p> <p>18 by the way. I didn't bill for every minute of my</p> <p>19 time.</p> <p>20 Q. How much time did you spend that you</p> <p>21 did not bill to counsel working on your report?</p> <p>22 A. I don't know because I didn't keep</p> <p>23 track of it. I wanted to be thorough in what I</p> <p>24 wrote on the report so, and I billed for what I</p>
<p style="text-align: right;">Page 191</p> <p>1 summary page where you laid out how it would</p> <p>2 apply to all the class members, you told me that</p> <p>3 you said will be available, what you meant was</p> <p>4 will be available or can be estimated.</p> <p>5 As you sit here today, do you have an</p> <p>6 expert opinion on the percentage of time where</p> <p>7 the labor cost will be available versus when the</p> <p>8 labor cost will have to be estimated?</p> <p>9 MR. FOSTER: Objection. Okay. Are you</p> <p>10 referring to a specific line in the report?</p> <p>11 MR. SCHUTTE: We talked about this for</p> <p>12 hours. I am talking about the line in the report</p> <p>13 where he wrote: For each class member, the cost</p> <p>14 incurred for unions services will be available.</p> <p>15 He then said what I meant was it will be</p> <p>16 available or can be estimated.</p> <p>17 BY MR. SCHUTTE:</p> <p>18 Q. My question is do you have an opinion</p> <p>19 as to how often the cost incurred for union</p> <p>20 services is available versus when it will have to</p> <p>21 be estimated?</p> <p>22 A. I have no opinion.</p> <p>23 Q. Okay. As you sit here, do you have</p> <p>24 any opinion or knowledge of whether for many jobs</p>	<p style="text-align: right;">Page 193</p> <p>1 thought was fair and reasonable, and if I can</p> <p>2 understand the question differently, maybe I can</p> <p>3 be more helpful to you.</p> <p>4 Q. Again, I am not about hiding the ball</p> <p>5 so I'll be straight up on this. You said 15</p> <p>6 hours, okay. You cited a lot of articles you</p> <p>7 said you read. You wrote a report that is nine</p> <p>8 pages long. You did significant amounts of data</p> <p>9 manipulation and research, and I am trying to</p> <p>10 figure out how that breaks into 15 hours. And if</p> <p>11 it's more than 15 hours and you are just not</p> <p>12 billing some of that, I would like you to</p> <p>13 estimate that for the judge as well.</p> <p>14 MR. FOSTER: Objection, relevance.</p> <p>15 BY MR. SCHUTTE:</p> <p>16 Q. You can answer.</p> <p>17 A. I didn't keep track.</p> <p>18 Q. Okay. My last question is how did</p> <p>19 you -- well, actually I may have others.</p> <p>20 Do you have any knowledge as to</p> <p>21 whether union workers in the construction</p> <p>22 industry received more training than non-union</p> <p>23 workers?</p> <p>24 A. I don't have explicit knowledge.</p>

<p style="text-align: right;">Page 194</p> <p>1 Q. Okay. Do you agree that the number of</p> <p>2 hours that were used or that were put in on a</p> <p>3 particular project or renovation project matter</p> <p>4 in your analysis or your framework for the class</p> <p>5 damages?</p> <p>6 A. I think they would be reflected in the</p> <p>7 cost of labor.</p> <p>8 Q. Okay. If they can be either directly</p> <p>9 ascertained or estimated?</p> <p>10 A. As we have discussed, yes.</p> <p>11 Q. Yes. How did you come to be -- if you</p> <p>12 know, how did you come to be retained as an</p> <p>13 expert in this case? Have you worked with any</p> <p>14 counsel before?</p> <p>15 Just tell us about that.</p> <p>16 A. I have worked with Foster PC before.</p> <p>17 Q. Okay. And what kind of case did you</p> <p>18 work with Foster PC on?</p> <p>19 A. On a RICO case.</p> <p>20 Q. And I want to be careful because I</p> <p>21 don't want to invade this --</p> <p>22 A. Yes, thank you.</p> <p>23 Q. -- was it a consulting expert?</p> <p>24 Because you said you have never been an expert</p>	<p style="text-align: right;">Page 196</p> <p>1 THE VIDEOGRAPHER: Going off the video</p> <p>2 record at 3:06 p.m.</p> <p>3 (WHEREUPON, a recess was had at</p> <p>4 3:06 p.m. until 3:11 p.m.)</p> <p>5 THE VIDEOGRAPHER: We are back on the video</p> <p>6 record at 3:11 p.m.</p> <p>7 MR. FOSTER: And we have no questions for</p> <p>8 Dr. Kaestner.</p> <p>9 MR. SCHUTTE: Dr. Kaestner, thank you for</p> <p>10 your time and your patience.</p> <p>11 THE VIDEOGRAPHER: We are going off the</p> <p>12 video record at 3:11 p.m. This concludes today's</p> <p>13 testimony. The master video will be retained by</p> <p>14 Veritext Legal Solutions. Thank you and good</p> <p>15 night.</p> <p>16 (WHEREUPON, the deposition was</p> <p>17 concluded at 3:11 p.m.)</p> <p>18</p> <p>19</p> <p>20</p> <p>21</p> <p>22</p> <p>23</p> <p>24</p>
<p style="text-align: right;">Page 195</p> <p>1 witness before.</p> <p>2 A. I haven't been deposed as an expert</p> <p>3 witness.</p> <p>4 Q. You have been retained as an expert</p> <p>5 witness?</p> <p>6 A. I have been retained to provide</p> <p>7 research that -- for my expertise.</p> <p>8 MR. FOSTER: Can I just -- he was a</p> <p>9 consulting expert.</p> <p>10 BY MR. SCHUTTE:</p> <p>11 Q. I don't want to touch that.</p> <p>12 A. Okay. Thank you.</p> <p>13 Q. You said -- and I left open a loophole</p> <p>14 then which is: On how many occasions have you</p> <p>15 been retained as a consulting expert as opposed</p> <p>16 to a testifying expert?</p> <p>17 A. Three or four.</p> <p>18 Q. Okay. Is that a significant portion</p> <p>19 of your income currently?</p> <p>20 A. Unfortunately, no.</p> <p>21 MR. SCHUTTE: I think I have nothing</p> <p>22 further. Do you have any questions?</p> <p>23 MR. FOSTER: Can we take a little break and</p> <p>24 we will chat, and we will let you know promptly.</p>	<p style="text-align: right;">Page 197</p> <p>1 CERTIFICATE</p> <p>2 OF</p> <p>3 CERTIFIED SHORTHAND REPORTER</p> <p>4</p> <p>5 I, ANDREA L. KIM, a State of Illinois</p> <p>6 Licensed Certified Shorthand Reporter, License</p> <p>7 number 84-3722, do hereby certify:</p> <p>8 That previous to the commencement of</p> <p>9 the examination of the aforesaid witness, the</p> <p>10 witness was duly sworn or affirmed to testify the</p> <p>11 whole truth concerning the matters herein;</p> <p>12 That the foregoing deposition</p> <p>13 transcript was reported stenographically by me,</p> <p>14 was thereafter reduced to typewriting under my</p> <p>15 personal direction and constitutes a true and</p> <p>16 accurate record of the testimony given and the</p> <p>17 proceedings had at the aforesaid deposition;</p> <p>18 That the said deposition was taken</p> <p>19 before me at the time and place specified;</p> <p>20 That I am not a relative or employee</p> <p>21 or attorney or counsel for any of the parties</p> <p>22 herein, nor a relative or employee of such</p> <p>23 attorney or counsel for any of the parties</p> <p>24</p>

<p style="text-align: right;">Page 198</p> <p>1 hereto, nor am I interested directly or 2 indirectly in the outcome of this action. 3 4 IN WITNESS WHEREOF, I do hereunto set 5 my hand and affix my seal of office at Chicago, 6 Illinois, this 25th day of February, 2020. 7 8 9 10 11 12 13 14 <i>Andrea L. Kim</i> 15 ANDREA L. KIM, CSR 16 License No. 84-3722. 17 18 19 20 21 22 23 24</p>	<p style="text-align: right;">Page 200</p> <p>1 DEPOSITION REVIEW CERTIFICATION OF WITNESS 2 3 ASSIGNMENT REFERENCE NO: 4001030 CASE NAME: Wacker Drive Executive Suites, LLC v. Jones Lang Lasalle Americas (Illinois), LP DATE OF DEPOSITION: 2/21/2020 4 WITNESS' NAME: Robert Kaestner, Ph.D. 5 In accordance with the Rules of Civil Procedure, I have read the entire transcript of 6 my testimony or it has been read to me. 7 I have made no changes to the testimony as transcribed by the court reporter. 8 9 Date _____ Robert Kaestner, Ph.D. 10 Sworn to and subscribed before me, a Notary Public in and for the State and County, 11 the referenced witness did personally appear and acknowledge that: 12 They have read the transcript; 13 They signed the foregoing Sworn Statement; and 14 Their execution of this Statement is of their free act and deed. 15 I have affixed my name and official seal 16 this _____ day of _____, 20____. 17 18 _____ Notary Public 19 _____ Commission Expiration Date 20 21 22 23 24 25</p>
<p style="text-align: right;">Page 199</p> <p>1 Veritext Legal Solutions 1100 Superior Ave 2 Suite 1820 Cleveland, Ohio 44114 3 Phone: 216-523-1313 4 February 27, 2020 5 To: Mr. Zouras 6 Case Name: Wacker Drive Executive Suites, LLC v. Jones Lang Lasalle 7 Americas (Illinois), LP 8 Veritext Reference Number: 4001030 9 Witness: Robert Kaestner, Ph.D. Deposition Date: 2/21/2020 10 Dear Sir/Madam: 11 12 Enclosed please find a deposition transcript. Please have the witness 13 review the transcript and note any changes or corrections on the 14 included errata sheet, indicating the page, line number, change, and 15 the reason for the change. Have the witness' signature notarized and 16 forward the completed page(s) back to us at the Production address shown 17 above, or email to production-midwest@veritext.com. 18 19 If the errata is not returned within thirty days of your receipt of 20 this letter, the reading and signing will be deemed waived. 21 Sincerely, 22 23 Production Department 24 NO NOTARY REQUIRED IN CA</p>	<p style="text-align: right;">Page 201</p> <p>1 DEPOSITION REVIEW CERTIFICATION OF WITNESS 2 3 ASSIGNMENT REFERENCE NO: 4001030 CASE NAME: Wacker Drive Executive Suites, LLC v. Jones Lang Lasalle Americas (Illinois), LP DATE OF DEPOSITION: 2/21/2020 4 WITNESS' NAME: Robert Kaestner, Ph.D. 5 In accordance with the Rules of Civil Procedure, I have read the entire transcript of 6 my testimony or it has been read to me. 7 I have listed my changes on the attached Errata Sheet, listing page and line numbers as 8 well as the reason(s) for the change(s). 9 I request that these changes be entered as part of the record of my testimony. 10 11 I have executed the Errata Sheet, as well as this Certificate, and request and authorize that both be appended to the transcript of my 12 testimony and be incorporated therein. 13 14 Date _____ Robert Kaestner, Ph.D. 15 Sworn to and subscribed before me, a Notary Public in and for the State and County, the referenced witness did personally appear 16 and acknowledge that: 17 They have read the transcript; 18 They have listed all of their corrections in the appended Errata Sheet; 19 They signed the foregoing Sworn Statement; and 20 Their execution of this Statement is of their free act and deed. 21 I have affixed my name and official seal 22 this _____ day of _____, 20____. 23 24 _____ Notary Public 25 _____ Commission Expiration Date</p>



1	ERRATA SHEET
2	VERITEXT LEGAL SOLUTIONS MIDWEST
3	ASSIGNMENT NO: 2/21/2020
4	PAGE/LINE(S) / CHANGE /REASON
5	
6	
7	
8	
9	
10	
11	
12	
13	
14	
15	
16	
17	
18	
19	
20	Date Robert Kaestner , Ph.D.
21	SUBSCRIBED AND SWORN TO BEFORE ME THIS
22	DAY OF , 20 .
23	
24	Notary Public
25	Commission Expiration Date